



DX9100VS Viewstation



C639M-A (6/04)

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IMPORTANT SAFETY INSTRUCTIONS

1. Read these instructions.
2. Keep these instructions.
3. Heed all warnings.
4. Follow all instructions.
5. Do not use this apparatus near water.
6. Clean only with dry cloth.
7. Do not block any ventilation openings. Install in accordance with the manufacturer's instructions.
8. Do not install near any heat sources such as radiators, heat registers, stoves, or other apparatus (including amplifiers) that produce heat.
9. Do not defeat the safety purpose of the polarized or grounding-type plug. A polarized plug has two blades with one wider than the other. A grounding plug has two blades and a third grounding prong. The wide blade or the third prong is provided for your safety. If the provided plug does not fit into your outlet, consult your electrician for replacement of the obsolete outlet.
10. Protect the power cord from being walked on or pinched, particularly at the plug, convenience receptacle, and the point where it exits from the apparatus.
11. Only use attachments/accessories specified by the manufacturer.
12. Use only with the cart, stand, tripod, bracket, or table specified by the manufacturer, or sold with the apparatus. When a cart is used, use caution when using the cart/apparatus combination to avoid injury from tip-over.
13. Refer all servicing to qualified service personnel. Servicing is required when the apparatus has been damaged in any way, such as when the power supply cord or plug is damaged, liquid has been spilled or objects have fallen into the apparatus, the apparatus has been exposed to rain or moisture, the apparatus does not operate normally, or the apparatus has been dropped.
14. Apparatus should not be exposed to dripping or splashing, and no objects filled with liquids, such as vases, should be placed on the apparatus.
15. **WARNING:** To reduce the risk of fire or electric shock, do not expose this apparatus to rain or moisture.
16. Installation should be done only by qualified personnel and conform to all local codes.
17. Use only installation methods and materials capable of supporting four times the maximum specified load.

The socket-outlet shall be installed near the equipment and shall be easily accessible.

CAUTION: These servicing instructions are for use by qualified service personnel only. To reduce the risk of electric shock do not perform any servicing other than that contained in the operating instructions unless you are qualified to do so.

CAUTION: Danger of explosion if battery is incorrectly replaced. Replace only with the same or equivalent type. Dispose of used batteries according to the instructions provided by the battery manufacturer.

Only use replacement parts recommended by Pelco.

DESCRIPTION

This manual provides instructions for operating your DX9100VS viewstation, which is your interface with the DX9000 and DX9100 digital video recorders. The viewstation offers many functions, including the following:

- Simultaneous viewing of live or recorded video can be seen from as many as four cameras.
- Live video can be marked for later review by the user or via motion detection.
- A scan feature allows the user to search recorded video for movement of a specific object.
- Video files can be saved in MPEG format to a compact disk, hard drive, or anywhere on the network.
- A current video frame can be printed on a standard PC printer.

GETTING STARTED

The viewstation is already connected to the recorder and ready to operate. All you have to do is turn it on, log in, and then drag and drop cameras into the four windows to begin viewing video.

The recording schedule and who can operate the viewstation should have been set up during the installation process. If you want to change the recording schedule or change the users who are authorized to use this viewstation, refer to the sections on *Camera Recording Properties* and *Defining Users*.

1. Turn the system on.

NOTE: Make sure you turn on the recorder first, and then the viewstation.

The system powers up and logs on automatically to the network. After a few seconds, the DX9100 viewstation dialog box appears automatically. If the log-in dialog box does not appear, double-click the DX9100 viewstation icon on your desktop.



Figure 1. Log-In Dialog Box

2. Enter your "User name" and Password.
3. Click Login. The main window appears. Refer to Figure 2.

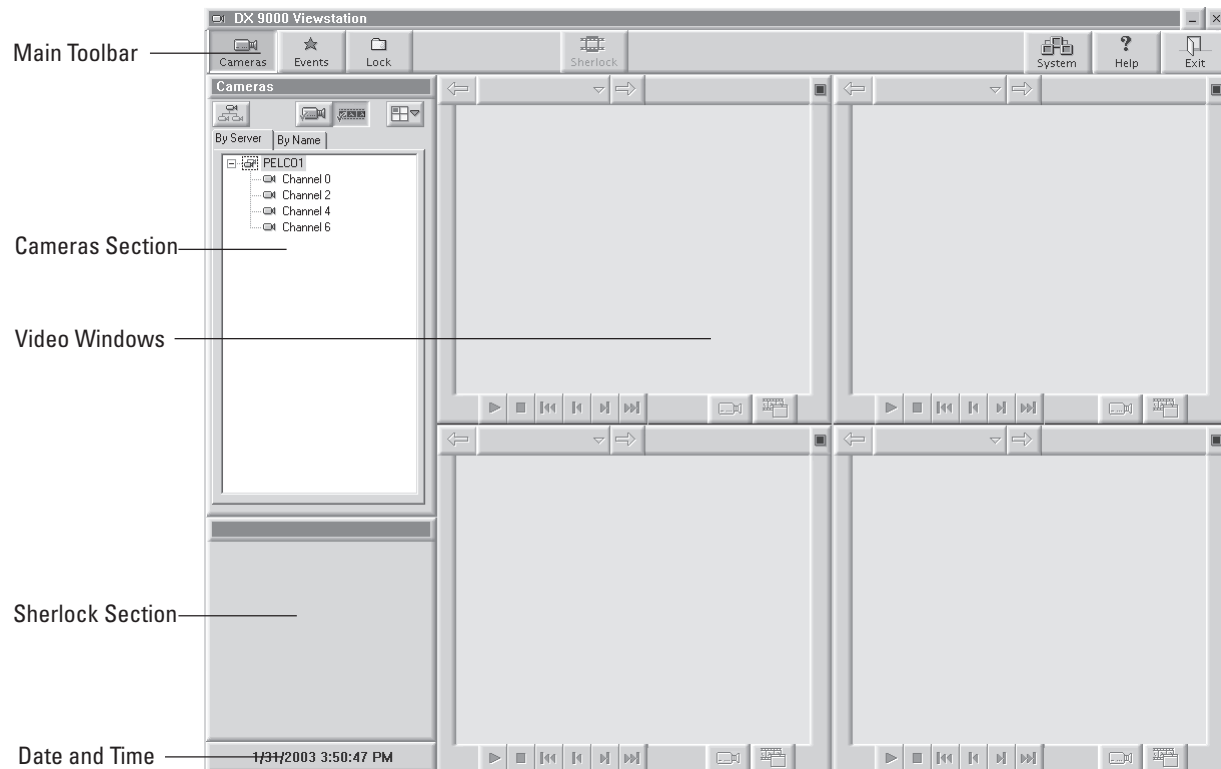


Figure 2. DX9100 Main Window

Main Toolbar: The toolbar consists of seven operation buttons.



Cameras Displays the cameras that are defined in the system by server or by name.



Events Displays the latest events that have occurred in the system by camera or by time. You can define and view new event queries.



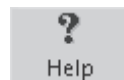
Lock Unlocks locked video files. You can also view videos that have been locked.



Sherlock Scans recorded video for movement or disappearance of a specific object.



System Sets camera properties and defines users. This button is available only to system administrators and operators with a Level 1 authorization. System administrators and Level 1 operators can set camera properties, but only system administrators can define users.



Help Accesses online help.



Exit Exits the application.

Video Windows: Each of the four video windows displays a live or playback video.



Cameras Section: This is the default section. The Events and Lock sections also appear here.

Sherlock Section: This section appears when you click Sherlock. It allows you to search for motion detection, including the disappearance of objects, during playback video.

Date and Time: The current date and time is displayed.

VIEWING LIVE VIDEO

You can view up to four different live videos on a DX9100 viewstation at the same time.

1. Click  .
2. Click  to expand the server and show all of the cameras.

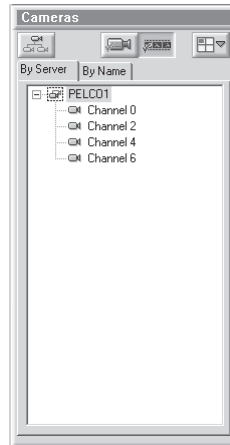






Figure 3. Live Video Cameras Section

NOTE: You can right-click a camera to see its properties.

3. Click  to view live video.
4. Drag and drop a camera into one of the windows.

NOTE: You can also click  to select a window. It displays four drop-down buttons. Each button has a blue square that shows the window that will play the video. For example, this button will play the video in the top left window.

5. Click  while viewing live video if you want a bigger view.
6. Click  to return to four windows.

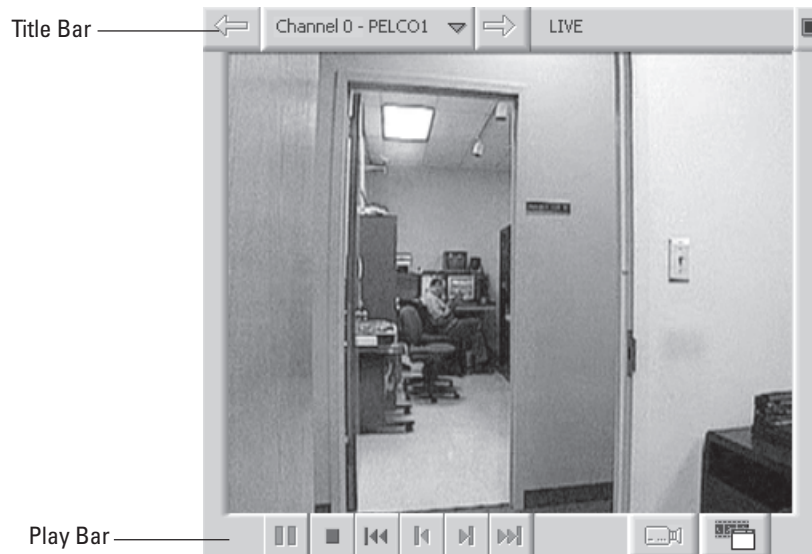
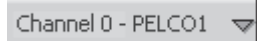


Figure 4. Video Window

Title Bar



Moves to the previous video in memory that was displayed in this window.



Shows the current camera name and site. Displays a drop-down box of the last 10 videos shown. The most recent video is at the bottom of the list.



Moves to the next video in memory that was displayed in this window.



Appears on the title bar if the video is live.



Switches the video to a larger screen.

Play Bar



Closes the video window.





Rewinds video 1 minute.



Switches to the load video dialog box.

VIEWING RECORDED VIDEO

You can view up to four different playback (recorded) videos on a DX9100 viewstation at the same time.

1. Click  Cameras .
2. Click  to expand the server and show all of the cameras.

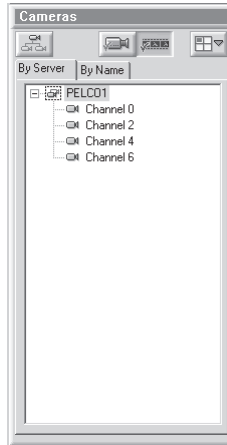



Figure 5. Recorded Video Cameras Section

NOTE: You can right-click a camera to see its properties.

3. Click  to view playback video.
4. Drag and drop a camera into one of the windows.

NOTE: You can also click  to select a window. It displays four drop-down buttons. Each button has a blue square that shows the window that will play the video. For example, this button will play the video in the top left window.

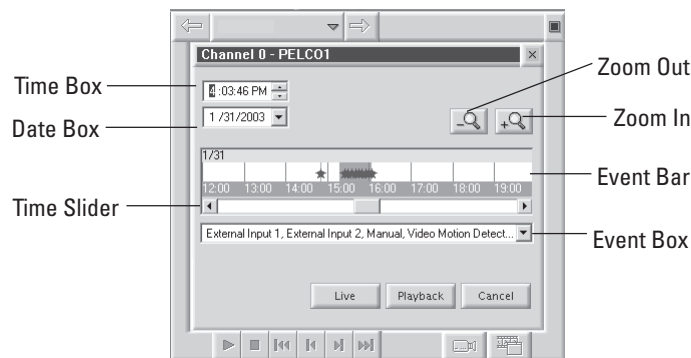


Figure 6. Load Video Dialog Box

Time Box: Displays the time of the playback video.

Date Box: Displays the date of the video. You can enter a new date or select a new date from the drop-down calendar.



Zoom Out: Zooms out on the event bar to a maximum of one week.

Zoom In: Zooms in on the event bar to a minimum of one minute.

Event Bar: Displays events.

Time Slider: Moves the time and date forward or backward.

Event Box: Displays the current event types for the video. You can select or clear events from the drop-down box. All events are selected by default.

5. Select a date and time.
6. Click Playback.
7. Click  while viewing recorded video if you want a bigger view.
8. Click  to return to four windows.

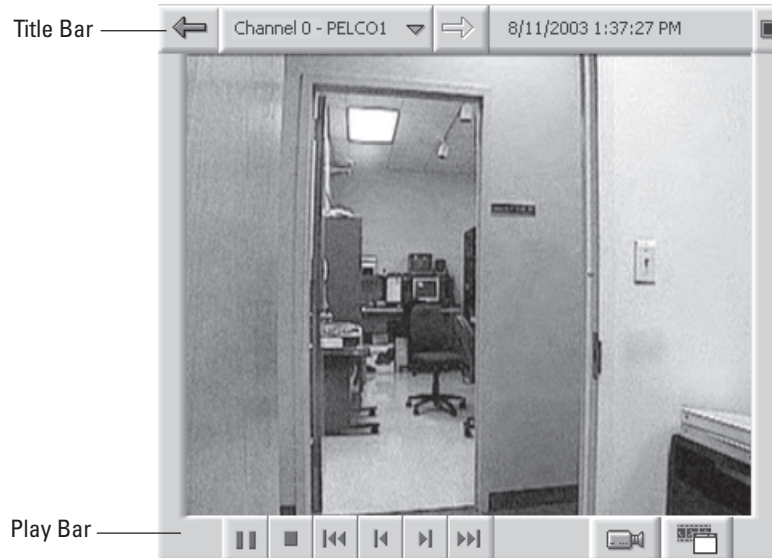


Figure 7. Video Window

Title Bar



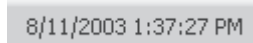
Moves to the previous video in memory that was displayed in this window.



Shows the current camera name and site. Displays a drop-down box of the last 10 videos shown. The most recent video is at the bottom of the list.



Moves to the next video in memory that was displayed in this window.



Displays the date and time on the title bar if the video is recorded.



Switches the video to a larger screen.

Play Bar



Pauses the video. This button is not available when viewing live video.



Closes the video window.



Rewinds video 10 seconds.



Rewinds video one second. This button is not available when viewing live video.



Forwards video one second. This button is not available when viewing live video.



Forwards video 10 seconds. This button is not available when viewing live video.



Switches to live video. This button is not available when viewing live video.



Switches to the load video dialog box.

VIEWING EVENTS

Events are videos of specific occurrences that have been marked for your review. There are six types of events that can be identified in the DX9100 viewstation. Each event type is assigned a star with a specific color for easy identification on the time slider.





Table A. Event Types

Event Type	Star Color	Description
External Input 1	Silver	An event imported into the DX9100 system from external devices, such as alarm units or access control systems.
External Input 2	Gold	An event imported into the DX9100 system from external devices, such as alarm units or access control systems.
Manual	Black	An event marked manually by the user.
Video Motion Detection	Red	An event marked automatically by the DVMD system when the DVMD recognizes movement in the predefined area(s).
No Signal Detection	Blue	An event marked automatically when there is no signal from the camera due to a failure. This event appears only once when the camera fails.
Signal Detection	Light Green	An event marked automatically when the signal from the camera is reidentified. This event appears only once when the camera is reidentified.



There are three ways to view events:

- Using the time slider
- Doing a query
- Choosing from the latest events

USING THE TIME SLIDER

1. Click  .
2. Click  to view playback video.
3. Click an event (star) on the time slider. The time box and date box show the time and date of the event.
4. Click Playback.
5. Click  while viewing the video if you want a bigger view.
6. Click  to return to four windows.

PERFORMING A QUERY

1. Click  .
2. Click  .
3. Select the query parameters.

NOTE: By default, the query includes all events, cameras, and dates and times.

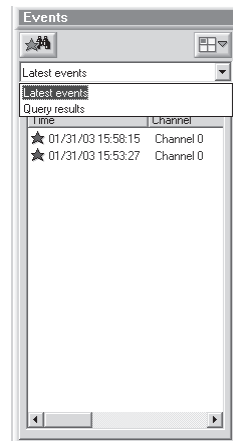


Figure 8. Events Section

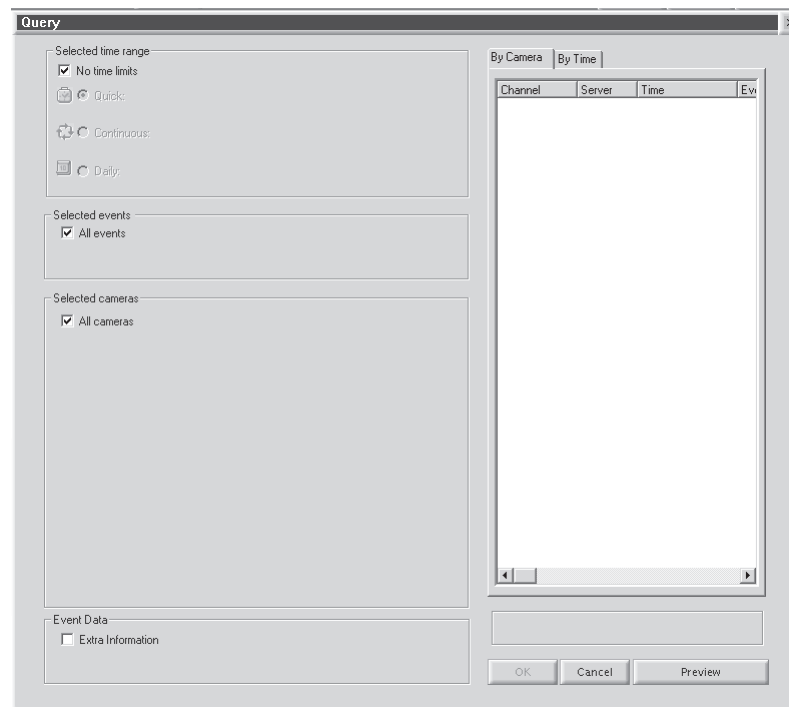


Figure 9. Main Query Window

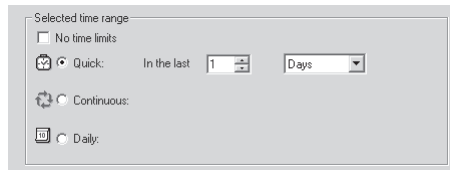
SELECTED TIME RANGE

You can select three different date and time periods:

- Quick: Perform a quick search within the last x hours or x days.
- Continuous: Search for events over a specified period.
- Daily: Search for events every day during the specified dates, between the specified times. For example, search for events every day in the month of January between 20:00 and 22:00.

Quick

1. Clear the “No time limits” checkbox.
2. Select the Quick radio button.
3. Select the number of days/hours from the “In the last” field.
4. Select days or hours.

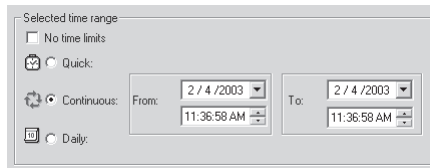


The screenshot shows a dialog box titled "Selected time range". It contains a "No time limits" checkbox which is unchecked. Below it are three radio buttons: "Quick" (selected), "Continuous", and "Daily". The "Quick" option is active, showing "In the last" followed by a numeric input field containing "1" and a dropdown menu set to "Days".

Figure 10. Quick Time Range

Continuous

1. Clear the “No time limits” checkbox.
2. Select the Continuous radio button.
3. Select the start date/time and the end date/time. The default is the current date and time.

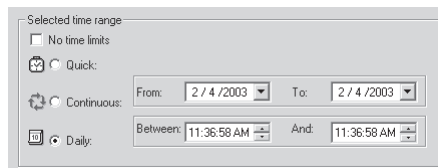


The screenshot shows the "Selected time range" dialog box with the "Continuous" radio button selected. The "No time limits" checkbox is unchecked. The "Continuous" option is active, showing "From:" and "To:" fields. Both are set to "2 / 4 / 2003" and "11:36:58 AM".

Figure 11. Continuous Time Range

Daily

1. Clear the “No time limits” checkbox.
2. Select the Daily radio button.
3. Select the start date and end date and the time period.



The screenshot shows the "Selected time range" dialog box with the "Daily" radio button selected. The "No time limits" checkbox is unchecked. The "Daily" option is active, showing "Between:" and "And:" fields. Both are set to "11:36:58 AM".

Figure 12. Daily Time Range

SELECTED EVENTS

To specify the event types to be included in the query:

1. Clear the "All events" checkbox.
2. Select the events you want to include in the query.

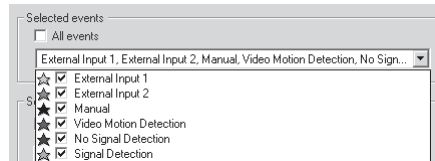




Figure 13. Events Query

SELECTED CAMERAS

To specify the cameras to be included in the query:

1. Clear the "All cameras" checkbox.
2. Click the + next to the server name to view the server's cameras.
3. Double-click the server name to add all cameras to a query or double-click the camera to add a single camera to a query.
4. Click  to remove all cameras or select a camera and click  to remove a single camera.

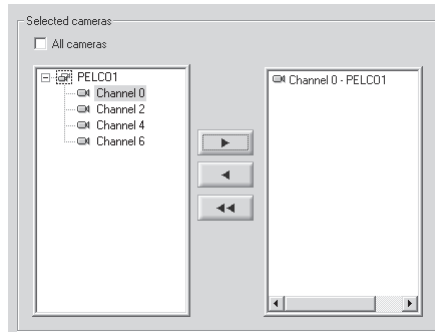


Figure 14. Cameras Query

EVENT DATA

The Extra Information box is used to add information that is received from external systems.

To search by event data:

1. Select the "Extra Information" checkbox.
2. Enter the information in the field.

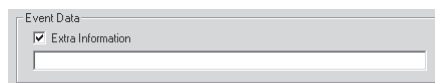


Figure 15. Event Data

RUNNING THE QUERY

1. Click Preview.

The number of events found appears at the bottom of the Preview Window. The events are arranged in descending order by server with the latest event at the top of the list. Up to 2,000 events can be displayed. The star color shows the event type.

2. Click the By Camera tab or By Time tab to view the results by camera or by time.
3. Click OK. The events are transferred to the Events Section and the Query Window closes.

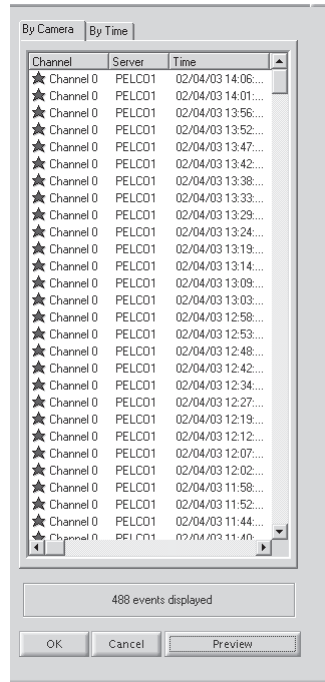



Figure 16. Preview Window

CHOOSING FROM THE LATEST EVENTS

The Events Section shows latest events and query results.

1. Click  Events .
2. Select "Latest events."
3. Select one of the events from the list that appears. An event that has happened in the last 60 seconds plays live video when dragged into one of the four video windows.

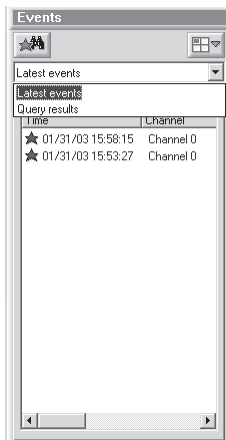


Figure 17. Events Section

MARKING EVENTS

You can mark an event and save it for viewing at a later time.

1. Click  while viewing live or playback video. The video picture enlarges.

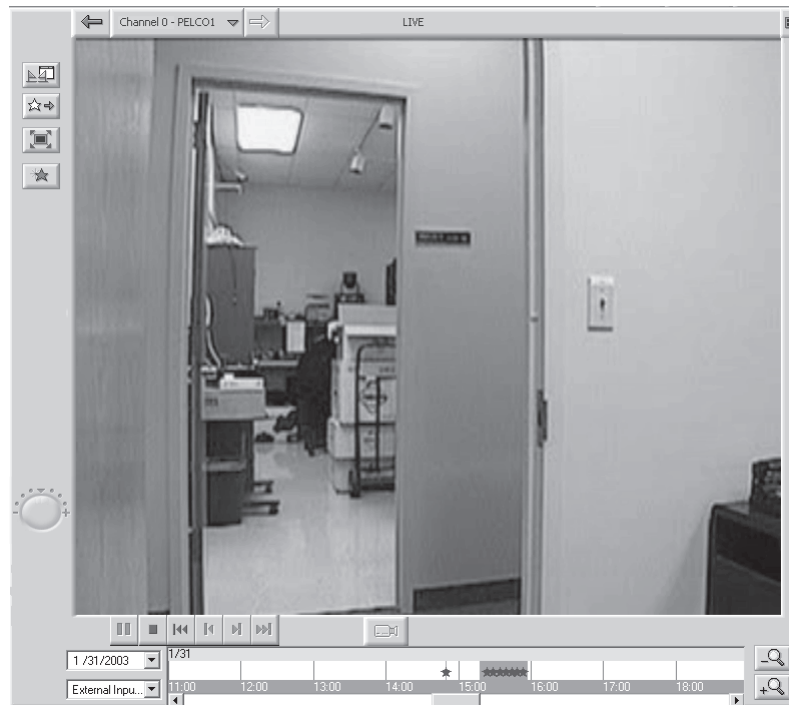


Figure 18. Large Screen



Allows you to lock sections of the video and export sections to different media.



Shows events.




Shows the video on the entire screen.



Marks and saves an event. The event is marked in black on the time slider.



Increases or decreases the video playback speed. The red button in the center of the speed meter marks the default speed. The + sign is 30 times the normal speed. The – sign shows frame-by-frame.

2. Click an event on the time slider.
3. Click . The following dialog box appears.

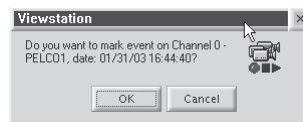




Figure 19. Mark Event Dialog Box

4. Click OK.
5. Click the Zoom Out button or the Zoom In button to see the marked event (black star) on the time slider.

SEARCHING FOR MOTION DETECTION

The DX9100 Sherlock feature allows you to scan recorded video forward and backward for movement or disappearance of a specific object.

1. Playback the video that you want to scan.
2. Click . **Sherlock** on the main toolbar is enabled.
3. Click . The Sherlock section appears.

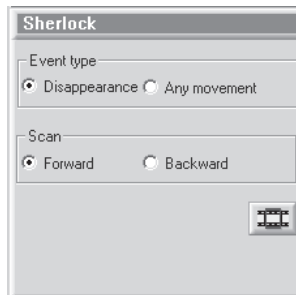



Figure 20. Sherlock Section

4. Select the Event Type.
 - Disappearance: The movement is marked as an event only if the marked object disappears completely from its current location.
 - Any Movement: The movement is marked as an event if the marked object moves from its current location.
5. Select scan forward or scan backward.
6. Click the desired object that you want to check for motion. A blue square marks the selected object. You can mark the object with up to 10 squares.



Figure 21. Marking An Object

7. Click  in the Sherlock section.

The clock at the bottom of the Sherlock section displays the current scanning time and “In progress...” appears.

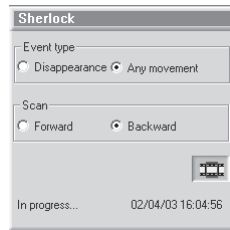


Figure 22. Scan In Progress Message

When the scan detects movement of the selected object, it stops and displays the event. A message with the date and time of the event appears.

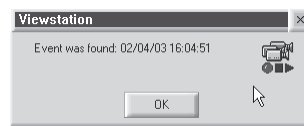




Figure 23. Event Found Dialog Box

NOTE: If you marked more than one object, the first scan shows the first object that moved.

LOCKING/UNLOCKING VIDEO

Locking the video removes the selected section of video from the first in/first out (FIFO) deletion cycle. You can only lock a section of video and not a current frame.

To lock a video:

1. Click  while viewing live or playback video.
2. Click . The following window appears.

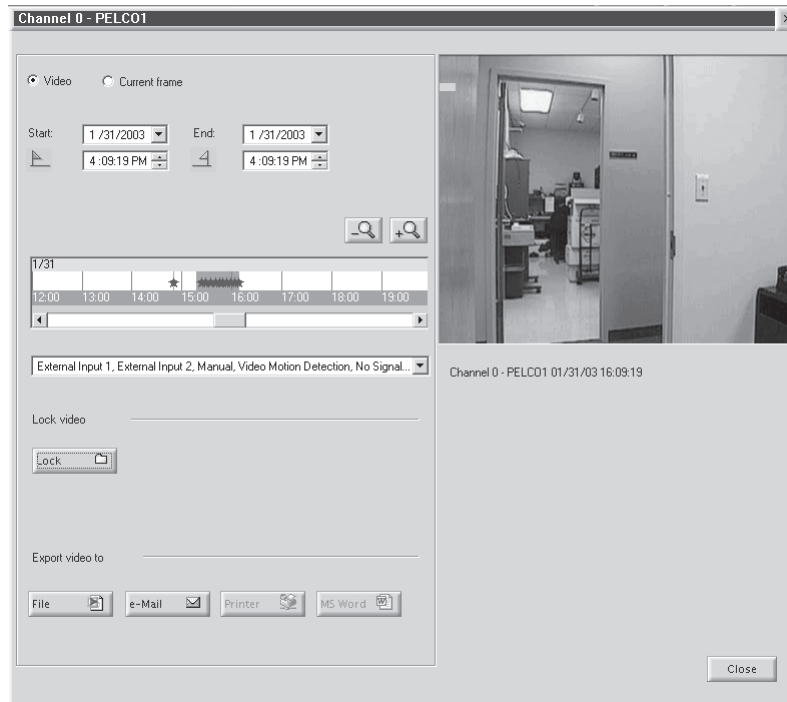


Figure 24. Window for Locking Video

3. Make sure the Video radio button is selected.
4. Select the Start/End date and time. The default is the date and time of the current video.

NOTE: You can also use the time slider to mark a time period. Refer to Figure 29.

5. Click . The following dialog box appears.

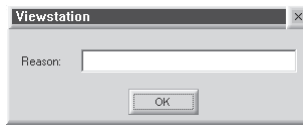


Figure 25. Dialog Box for Reason to Lock Video

6. Enter a reason for locking the selected video and then click OK. The following message appears.

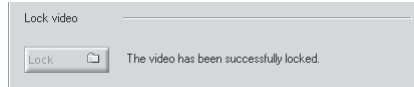


Figure 26. Lock Video Message

Only authorized users can unlock a locked video. This video is returned to the FIFO cycle and is deleted according to its location in the queue.

To unlock a video:


1. Click . The Lock section appears.





Figure 27. Lock Section

2. Select the server from the drop-down box. The locked videos appear in the section.
3. Select a locked video.

NOTE: You can view a locked video before unlocking it.

4. Click  or right-click the locked video and then select Unlock Video.
5. Enter a reason and then click OK. The locked video is unlocked and removed from the locked video list.

EXPORTING VIDEO

1. Click  while viewing live or playback video.
2. Click . The following window appears.

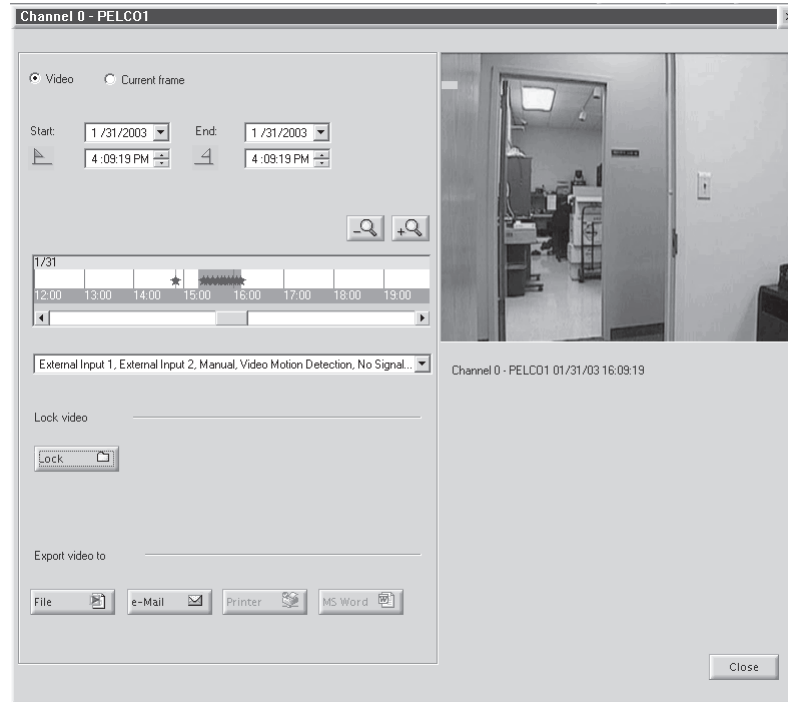


Figure 28. Exporting Video Window

3. Select the Video radio button to save a section of video.
4. Select the Start/End date and time. The default is the date and time of the current video.

You can also use the time slider to mark a time period. The selected area is marked in yellow as shown below. You can drag the beginning/end arrows of the marked time period to increase/decrease the video section.

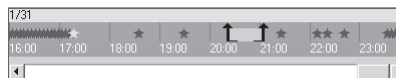




Figure 29. Time Slider Video Section

5. Select the event types to be shown on the time slider. All events are selected by default.
6. Export the video.
 - a. Click File to export the video and save it in an MPEG format.
 - b. Click e-Mail to attach the video in an MPEG format to an e-mail message.
7. Click Close to exit.

NOTE: You can view an exported video at any time using Export Viewer. Refer to the Export Viewer section.

EXPORTING A CURRENT FRAME

1. Click  while viewing live or playback video.
2. Click .
3. Select the "Current frame" radio button. The following window appears.

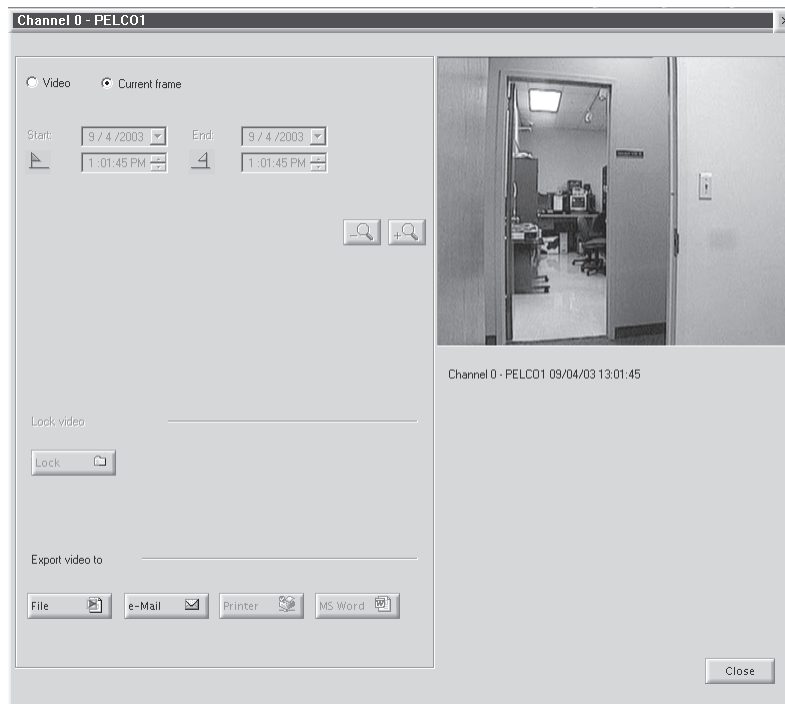


Figure 30. Exporting Current Frame Window

4. Export the frame.
 - a. Click File to export the frame and save it in a BMP or JPEG format.
 - b. Click e-Mail to attach the frame in a JPEG format to an e-mail message.
 - c. Click Printer to print the frame.
 - d. Click MS Word to insert the frame into a Word document. The image is saved in a JPEG format.
5. Click Close.

NOTE: The e-Mail and Printer buttons are disabled unless you set up your e-mail and printer. The MS Word button is disabled if MS Word is not installed.

CAMERA RECORDING PROPERTIES

Camera recording properties should be set by the system administrator during installation. Only system administrators and operators with a Level 1 authorization can set or change camera recording properties. To set or change camera recording properties, you must open the DX9000 Viewstation application. The System button on the main toolbar is not available to Level 2-6 operators. If you don't have access, see the system administrator.

To set or change camera recording properties:

1. Click System > Properties on the main toolbar. The following window appears.

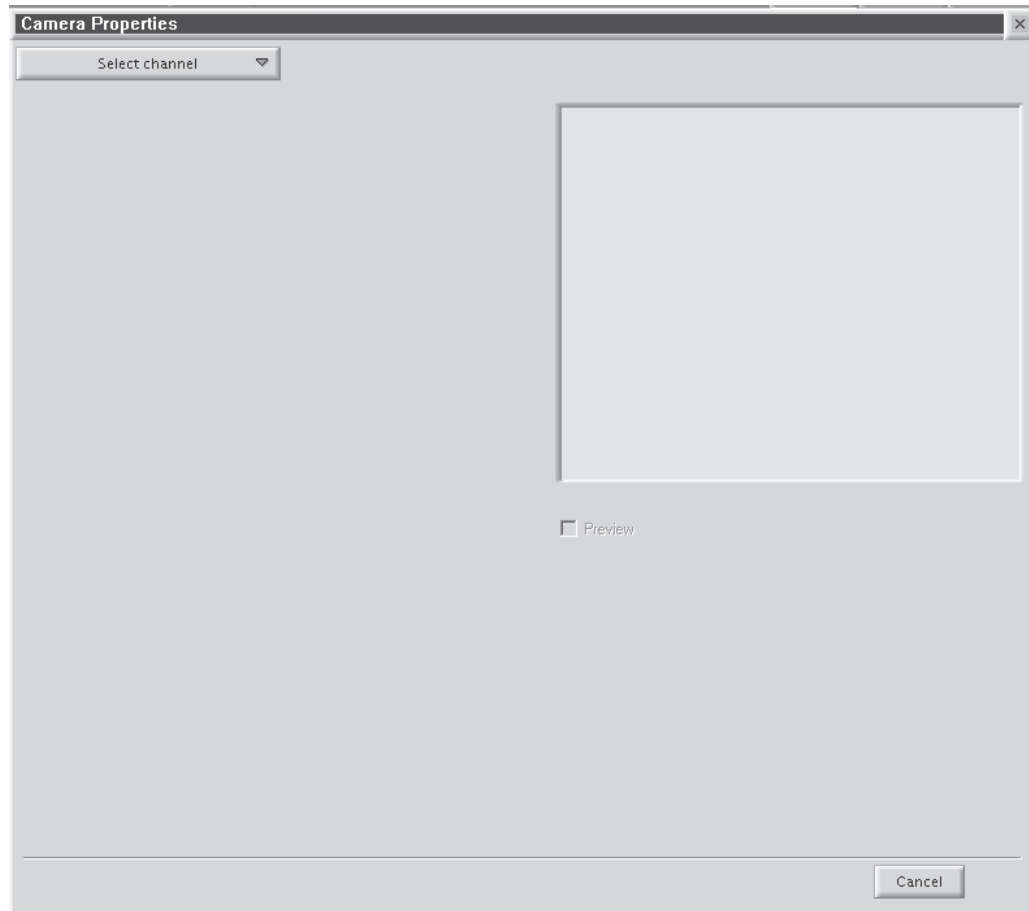


Figure 31. Camera Properties Dialog Box

2. Click "Select channel" to display a list of recorders. An example is shown below.

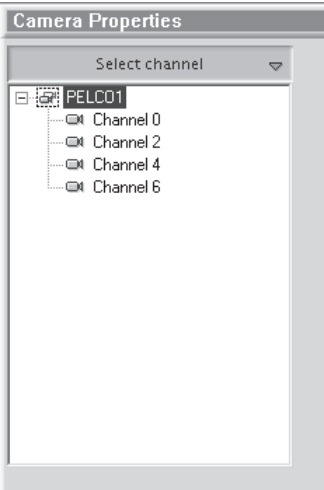


Figure 32. Select Channel Dialog Box

- 3. Select a channel.
- 4. Select the Preview checkbox to verify that you have the correct camera.

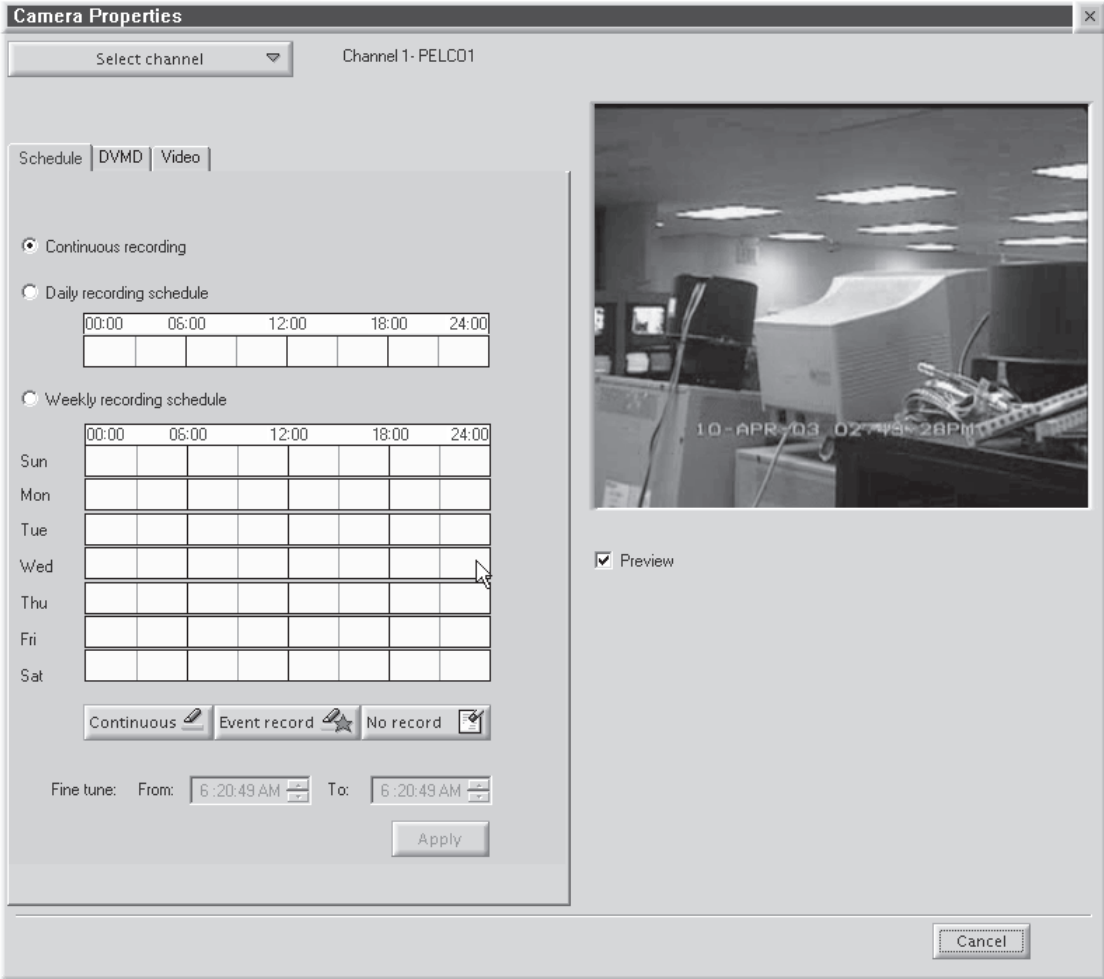


Figure 33. Continuous Recording Schedule Page

CONTINUOUS RECORDING SCHEDULE

1. Select the "Continuous recording" radio button. This is the default setting and should be selected already when you select a channel. Refer to Figure 33.
2. Click Apply.

Recording is done at all times and no schedule is defined. The entire daily and weekly recording schedules are marked in light yellow, and any previous definitions on the schedules are removed.

DAILY RECORDING SCHEDULE

To make sure there is no delay during scheduled recording, begin the recording at least five minutes before the actual recording time. For example, schedule the recording at 7:55 a.m. instead of 8:00 a.m.

1. Select the "Daily recording schedule" radio button.
2. Click Continuous or "Event record."
3. In the time bar, click the desired start/end times for recording, or enter the exact start/end times in the "Fine tune" fields.
4. Click Apply.

The example below shows a *Continuous* daily recording schedule from 7:05 a.m. to 12:05 p.m. The box in the time bar is blue with a red border. You can make the box smaller or larger by dragging it with your mouse.

Daily recording schedule

00:00 06:00 12:00 18:00 24:00

Weekly recording schedule

Sun

Mon

Tue

Wed

Thu

Fri

Sat

Continuous Event record No record

Fine tune: From: 7:05:00 AM To: 12:05:00 PM

Figure 34. Continuous Daily Recording Schedule Page

The example below shows a daily *Event record* schedule from 7:05 a.m. to 12:05 p.m. The box in the time bar is yellow with a red border. You can make the box smaller or larger by dragging it with your mouse.

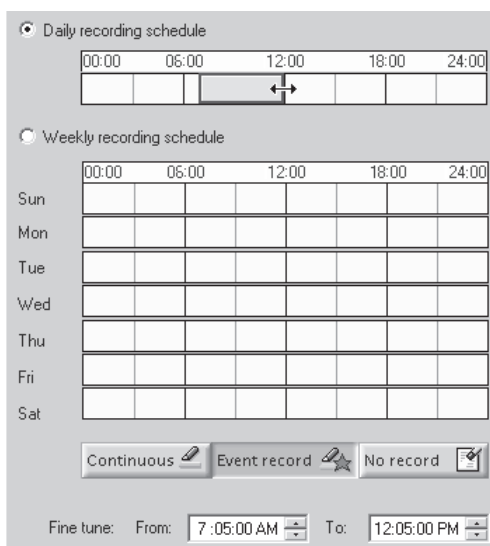


Figure 35. Daily Event Recording Page

If you select event recording, the DX9100 actually records continuously. The difference between continuous and event recording is the way the video is saved in the database. When the hard drives are full, the DX9100 starts overwriting the oldest video. With continuous recording, the DX9100 overwrites the video in the order in which it was recorded, whether it is an event or a nonevent. With event recording, the DX9100 overwrites nonevents first and then events. Data is overwritten on a day-to-day basis.

To delete a time period:

1. Click "No record."
2. Click the box in the time bar.

WEEKLY RECORDING SCHEDULE

To make sure there is no delay during scheduled recording, begin the recording at least five minutes before the actual recording time. For example, schedule the recording at 7:55 a.m. instead of 8:00 a.m.

1. Select the "Daily recording schedule" radio button.
2. Click Continuous or "Event record."
3. In the time bar, click the desired start/end times for recording, or enter the exact start/end times in the "Fine tune" fields.
4. Click Apply.

The example below shows a *Continuous* weekly recording schedule from 7:05 a.m. to 12:05 p.m. The boxes in the time bars are blue with a red border. You can make the boxes smaller or larger by dragging them with your mouse.

The screenshot shows a "Weekly recording schedule" window. At the top, there is a radio button selected for "Weekly recording schedule". Below this is a grid with days of the week (Sun to Sat) on the y-axis and time intervals (00:00, 06:00, 12:00, 18:00, 24:00) on the x-axis. A blue shaded area with a red border covers the time from 7:05 AM to 12:05 PM on all days from Sunday to Saturday. Below the grid are three buttons: "Continuous" (selected), "Event record", and "No record". At the bottom, there are "Fine tune" fields: "From: 7:05:00 AM" and "To: 12:05:00 PM".

Figure 36. Continuous Weekly Recording Schedule Page

The example below shows a weekly *Event record* schedule from 7:05 a.m. to 12:05 p.m. The boxes in the time bars are yellow with a red border. You can make the boxes smaller or larger by dragging them with your mouse.

The screenshot shows a "Weekly recording schedule" window, similar to Figure 36. The "Event record" radio button is selected. The grid shows yellow shaded boxes with red borders covering the time from 7:05 AM to 12:05 PM on all days from Sunday to Saturday. The "Fine tune" fields at the bottom are the same: "From: 7:05:00 AM" and "To: 12:05:00 PM".

Figure 37. Weekly Event Recording Schedule Page

To delete a time period:

1. Click "No record."
2. Click a box in a time bar.

MOTION DETECTION

1. Click the DVMD tab.
2. Select the "Detector on" radio button.
3. Select the Preview checkbox. The video has blue squares over the entire area meaning the entire video has been selected for motion detection.
4. Click "Clear all" to remove all of the boxes, or click the right mouse button on each box you want to remove.
5. Click "Mark all" to select the entire video for motion detection, or click the left mouse button to add individual boxes.
6. Click "Discard changes" to undo your changes.
7. Drag the triangles on the slider bars to select the minimum time between events and the video motion detection (VMD) sensitivity.
8. Click Apply.

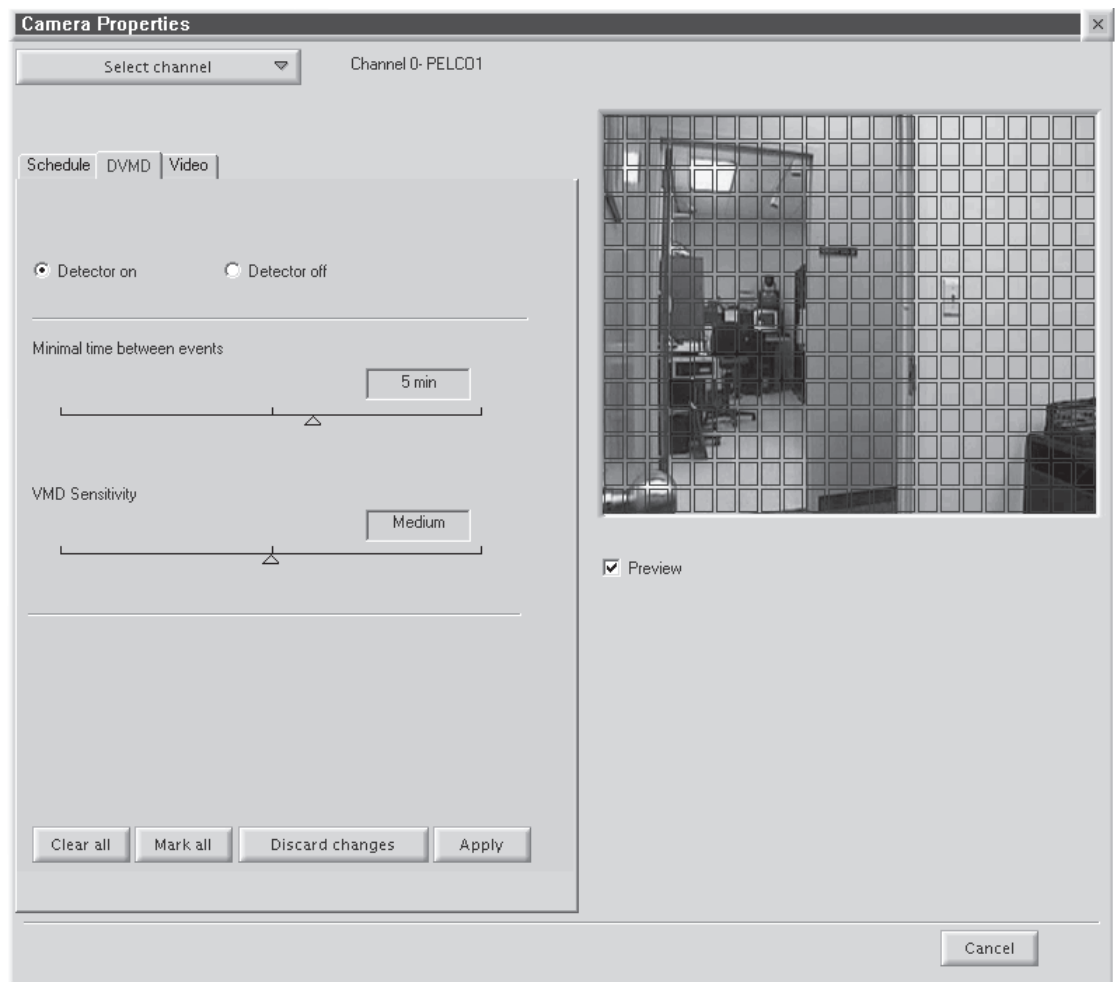


Figure 38. Motion Detection Page

CHANNEL SETUP

This section describes how to set camera properties to get the best picture.

1. Click the Video tab. The Video page appears. Refer to Figure 39.
2. Select the Preview checkbox to see the video quality with the default settings.
3. Adjust the video quality by dragging the triangles on the slider bars to the desired values. Refer to Table B.
4. Click Apply.

NOTE: The bit rate, located under the “Select channel” button, displays the amount of activity in the specified channel. A higher bit rate requires more storage space. It is important to notice the bit rate as you adjust your camera settings to achieve the highest quality picture with the lowest bit rate.

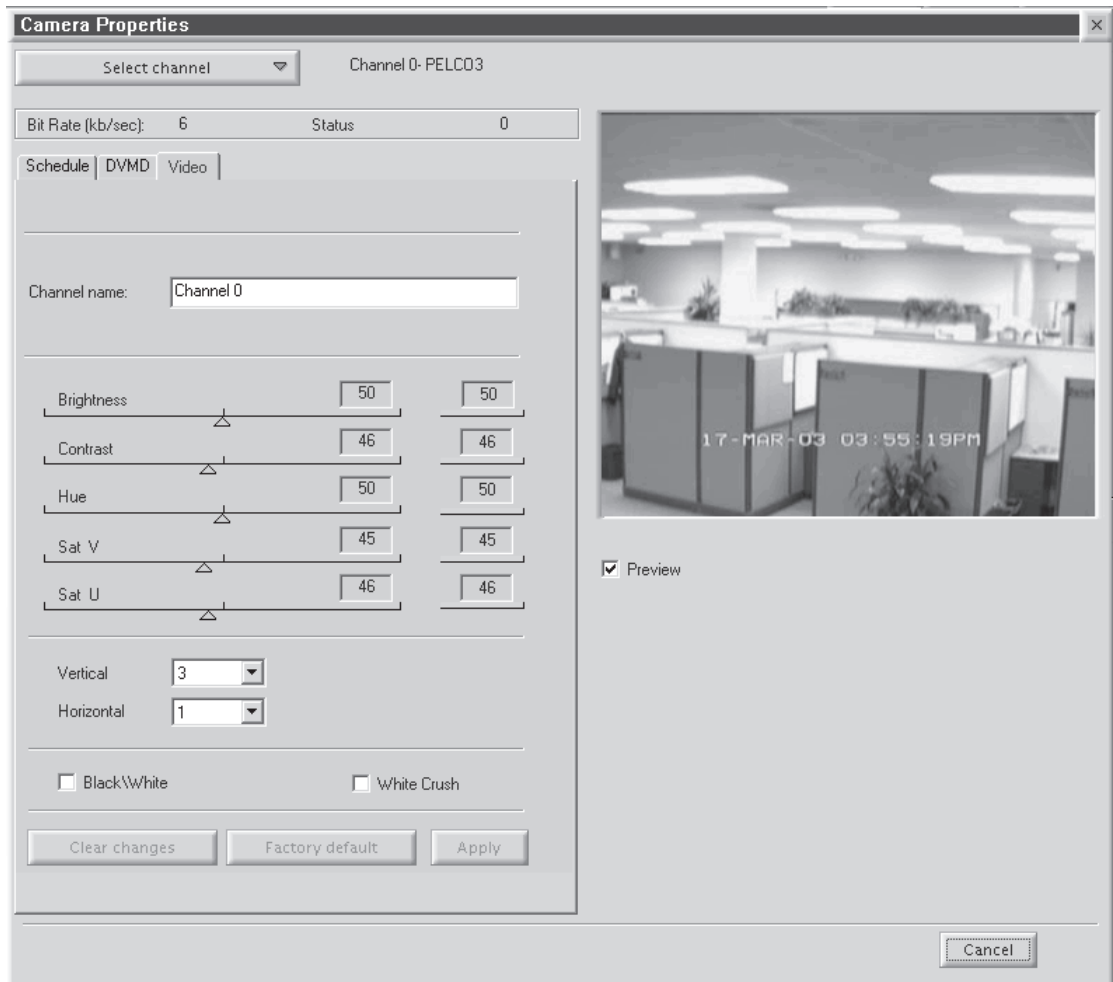


Figure 39. Camera Video Setup Page

Table B. Channel Setup

Parameter	Description/Action
Channel Name	Enter a new name for this channel. You can enter up to 20 characters.
Brightness	Drag the triangle to change the brightness value. The higher the value, the higher the bit rate. The previous value is displayed to the right of the brightness bar.
Contrast	Drag the triangle to change the contrast value. The higher the value, the higher the bit rate. The previous value is displayed to the right of the contrast bar.
Hue	Drag the triangle to change the hue value. The previous value is displayed to the right of the hue bar.
Sat V	Drag the triangle to increase or decrease the red color in the video. The previous value is displayed to the right of the Sat V bar.
Sat U	Drag the triangle to increase or decrease the blue color in the video. The previous value is displayed to the right of the Sat U bar.
Vertical	This reduces or eliminates video noise. The higher the value, the lower the bit rate. The lower the value, the higher the bit rate.
Horizontal	This reduces or eliminates video noise. The higher the value, the lower the bit rate. The lower the value, the higher the bit rate.
Black/White	Select this checkbox if the channel is connected to a black/white camera. This option ignores video noise.
White Crush	Select this checkbox to reduce the intensity of the white images.

DEFINING USERS

Only system administrators can define user names and passwords for the DX9100 Viewstation. Other users trying to access this option will get the following message:

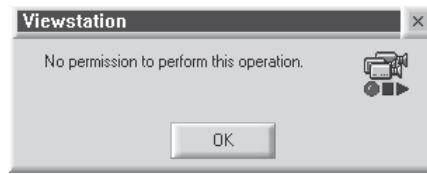


Figure 40. User Access Message Box

This option allows an administrator to add, delete, and change the properties of users in the DX9100 system. There are seven predefined user access levels ranging from Administrator to Operator Level 6. Each user is assigned different access rights to the DX9100 network and videos.

Click System > Users on the main toolbar. In the example below, each operator level has been assigned a user name and password.

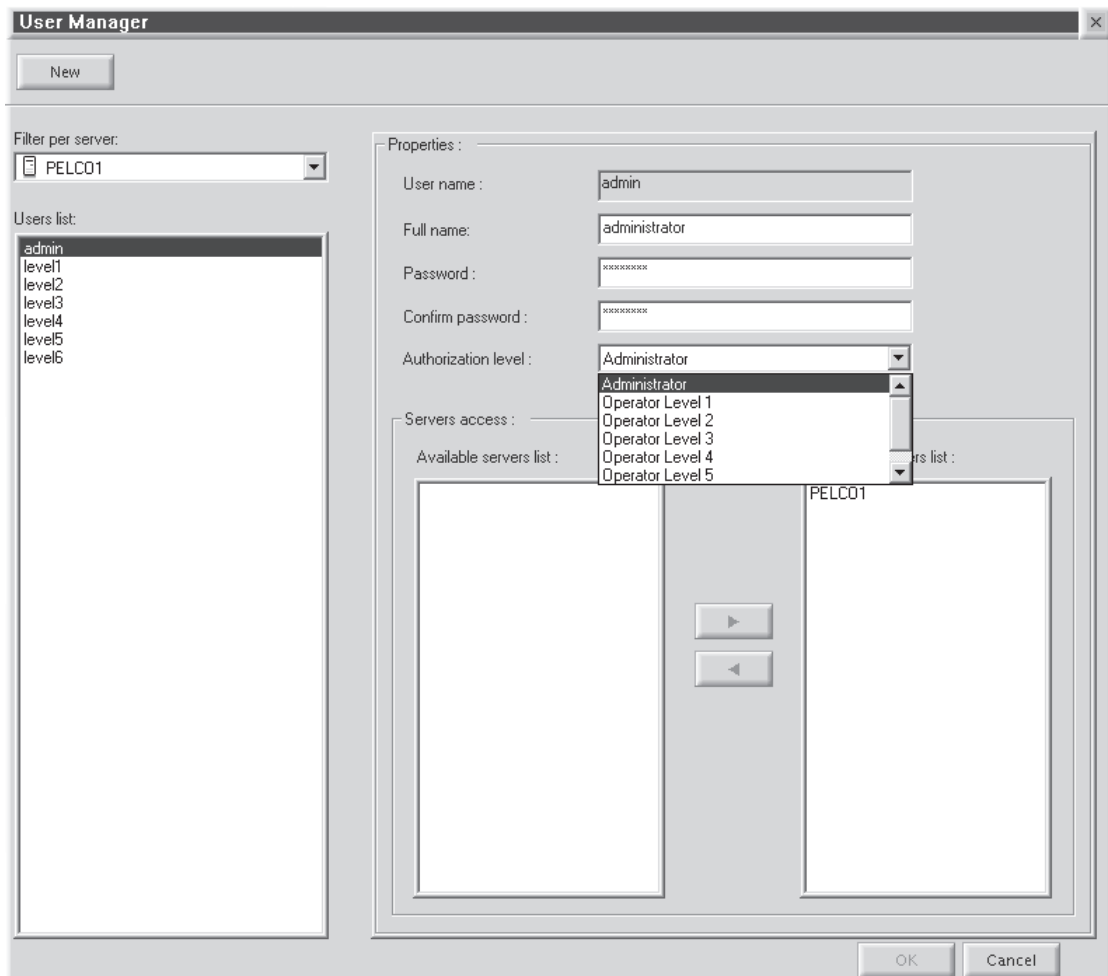


Figure 41 . User Manager Dialog Box

Table C. User Access Rights

User	Live Video/ Live Events	Video Playback/ Query/Sherlock	Locked Video Playback	Lock Video	Export Image/ Video	Unlock Video/ Change Camera Settings	Define Users/Audit Viewer
Administrator	✓	✓	✓	✓	✓	✓	✓
Operator Level 1	✓	✓	✓	✓	✓	✓	
Operator Level 2	✓	✓	✓	✓	✓		
Operator Level 3	✓	✓	✓	✓			
Operator Level 4	✓	✓	✓				
Operator Level 5	✓	✓					
Operator Level 6	✓						

Edit Existing Users

1. Select the server name from the "Filter per server" drop-down box. A list of users defined for the selected server appears under the Users List.
2. Select a user. The user's properties appear in the Properties panel.
3. Select a new operator authorization level.
4. Select the server name from the "Accessible servers list."
5. Click OK.

Adding a New User

1. Click New.
2. Enter the user name. This is the login user name.
3. Enter the user's full name.
4. Enter the user's password. This is the login password.
5. Re-enter the same password.
6. Select the user's authorization level: administrator or operator.
7. Highlight the server the user should have access to from the "Accessible servers list."
8. Click OK.

Deleting a User

1. Select the user name from the "Users list."
2. Select the server name from the "Accessible servers list."
3. Click the left arrow button.
4. Click OK.

ADVANCED FEATURES

AUDIT VIEWER

This is an external software application that is supplied with DX9000 systems. Before using this application, make sure you exit the viewstation application. This application audits every movement by the user in the system regardless of user access rights. All records include category type, time and date of operation, viewstation, and user login ID. For any report generated by the Audit Viewer, there is a maximum of 2,000 records per recorder.

1. Go to Start > Programs > DX9000 Viewstation > Audit Viewer. The following dialog box appears.

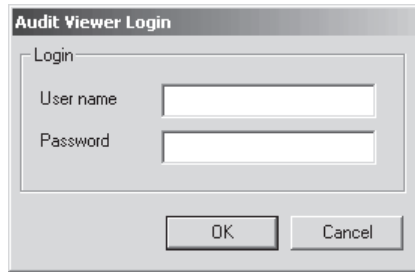


Figure 42. Audit Viewer Login Dialog Box

2. Enter your "User name" and Password and then click OK. The following window appears.

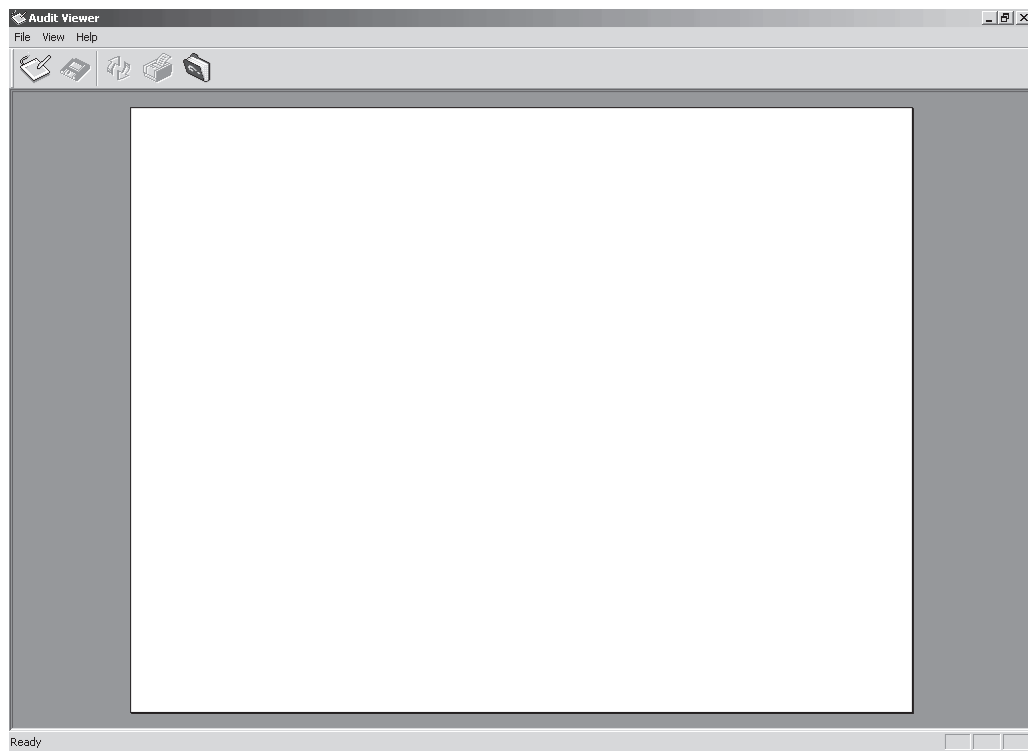







Figure 43. Audit Viewer Window

Table D. Audit Viewer Toolbar

Icon	Description
	This is the Create New Report icon. Click to modify columns, define filters, and sort columns.
	This is the Save icon. Click to save the audit report. You can save the report as an HTML, PDF, or TXT file type.
	This is the Refresh icon. Click to refresh the audit report.
	This is the Print icon. Click to print the audit report.
	This is the About icon. Click to display the Audit Viewer version number.

CREATING REPORTS

You must define filters before you create a new report. You can define the category, user name, date and time, and computer name. You can also modify columns and sort columns.

1. Go to File > Create Report, or click the Create New Report icon. The following page appears.

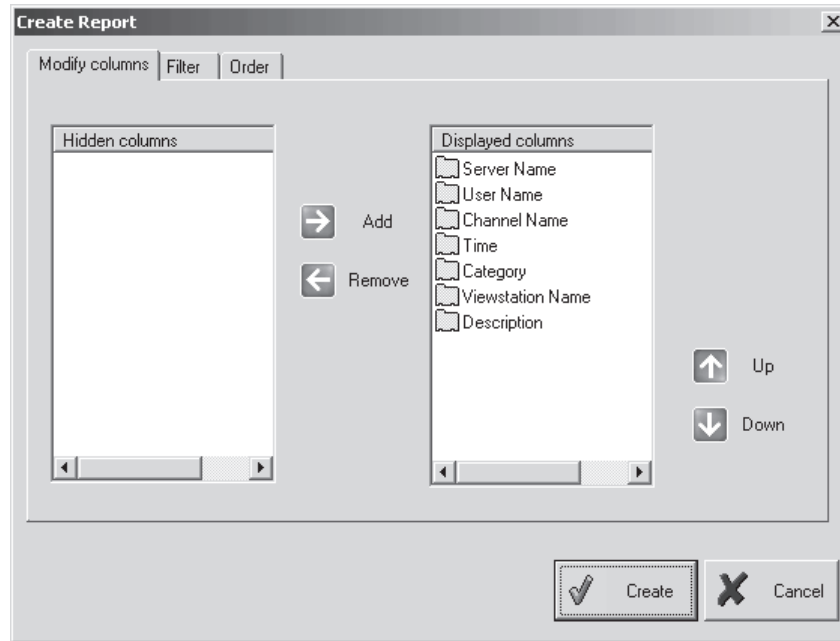


Figure 44. Modify Columns Page

2. Add or Remove the columns you want to appear on your report.
3. Click the Filter tab. The following page appears.

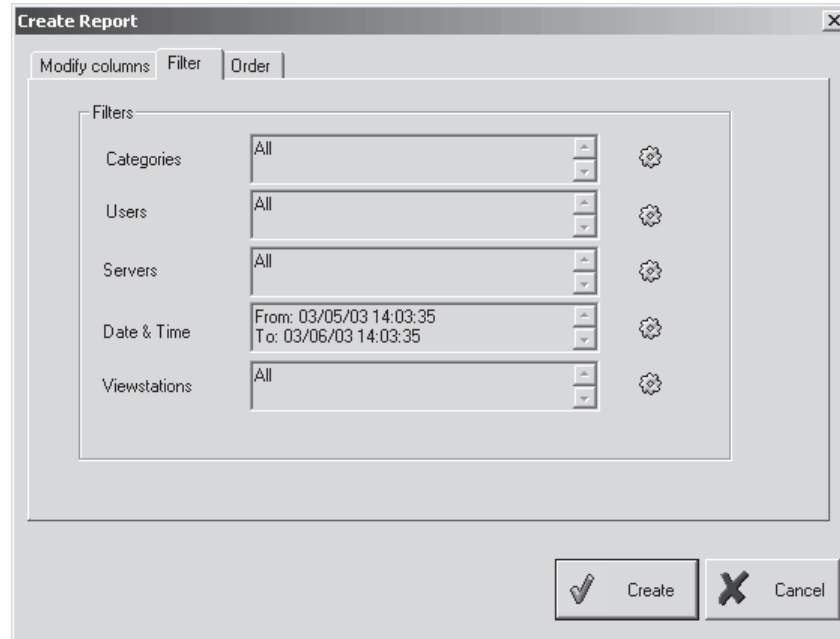


Figure 45. Filter Page

- Click the yellow icon next to Categories. The following dialog box appears.

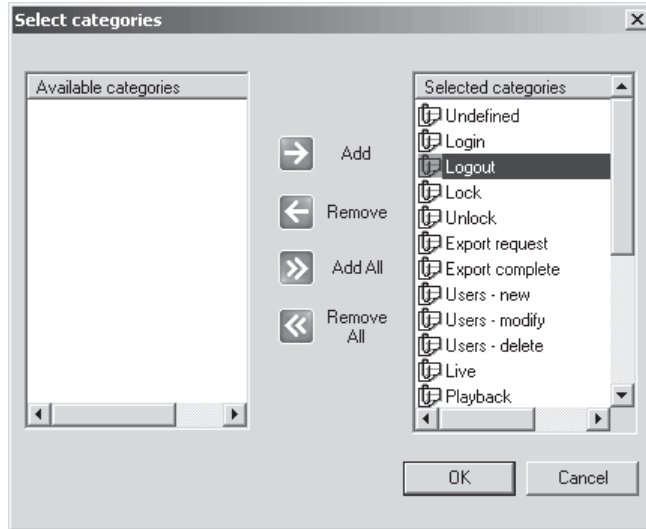


Figure 46. Select Category Dialog Box

- Add or remove categories and then click OK.
- Click the yellow icon next to Users. The following dialog box appears.

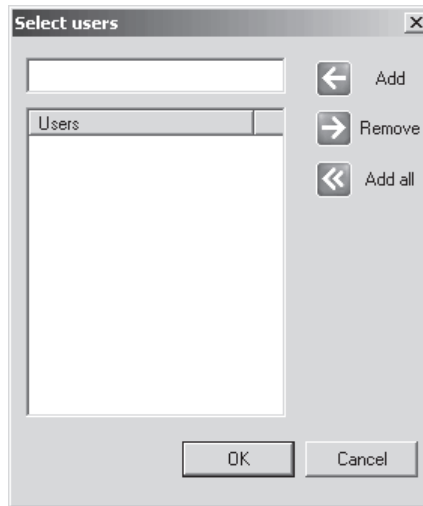


Figure 47. Select Users Dialog Box

- Add or remove users and then click OK.

- Click the yellow icon next to Servers. The following dialog box appears.

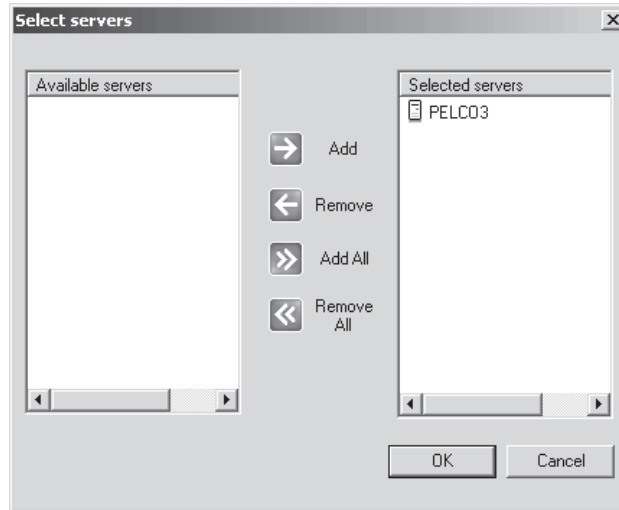


Figure 48. Select Servers Dialog Box

- Add or remove servers and then click OK.
- Click the yellow icon next to Date & Time. The following dialog box appears.

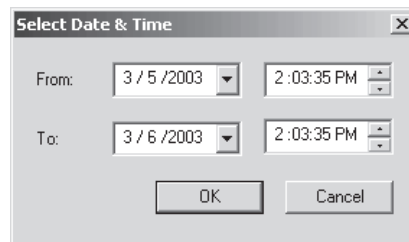


Figure 49. Select Date & Time Dialog Box

- Select the date and time range and then click OK.
- Click the yellow icon next to Viewstations. The following dialog box appears.

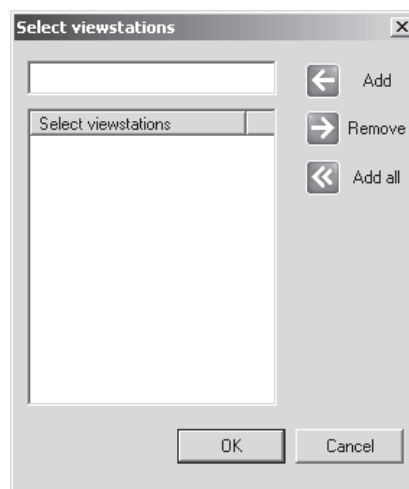


Figure 50. Select Viewstations Dialog Box

13. Add or remove viewstations and then click OK.
14. Click the Order tab. The following page appears.

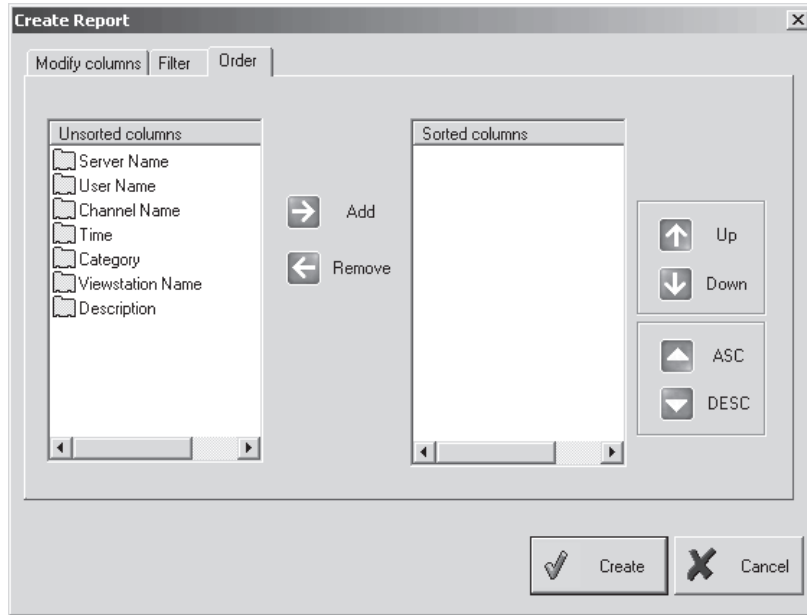


Figure 51. Order Page

15. Change the order of the filter settings. You can move them up or down or in ascending or descending order.
16. Click Create. An example of an audit report is shown in Figure 52.

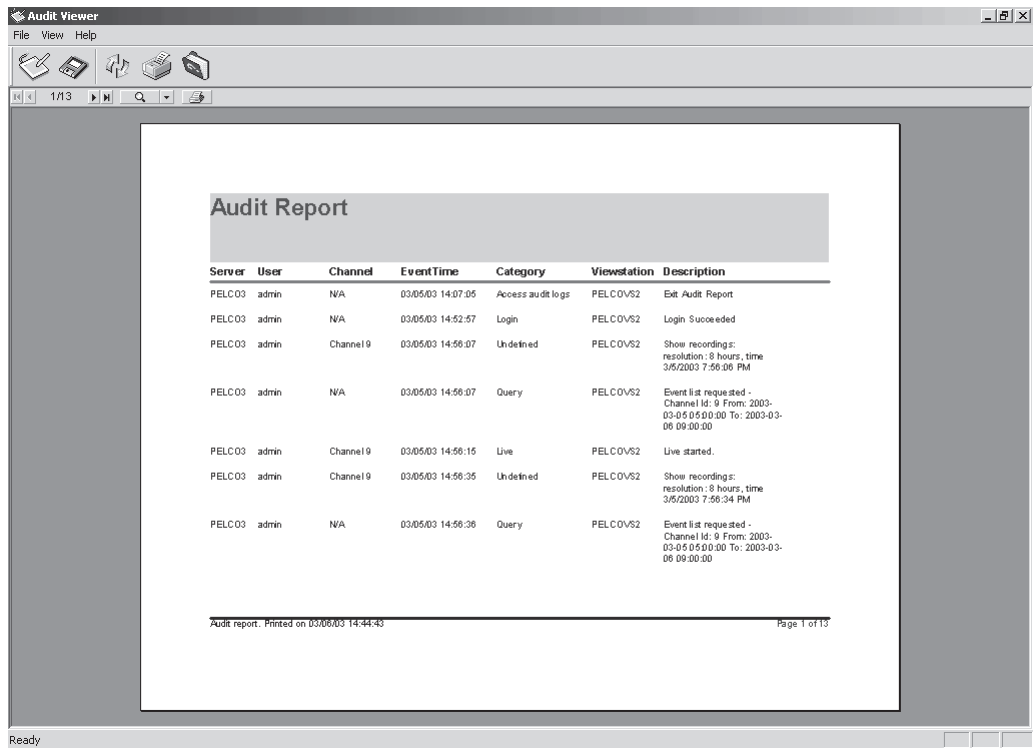


Figure 52. Sample Audit Report

NOTE: The Event Time is the local time. The time in the Description column is UTC time.

EXPORT VIEWER

The Export Viewer allows you to view exported videos without the DX9000 viewstation.

1. Go to Start > Programs > DX9000 Viewstation > Export Viewer. The following window appears.

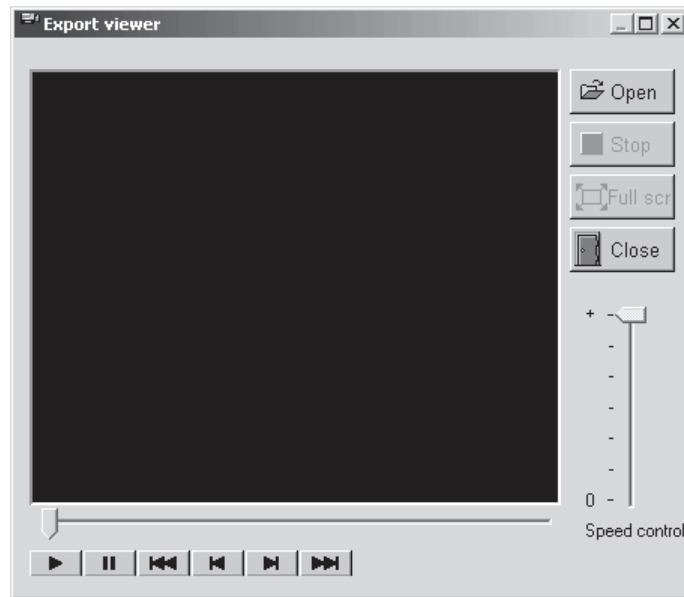


Figure 53. Export Viewer Window

2. Click Open. The following dialog box appears.

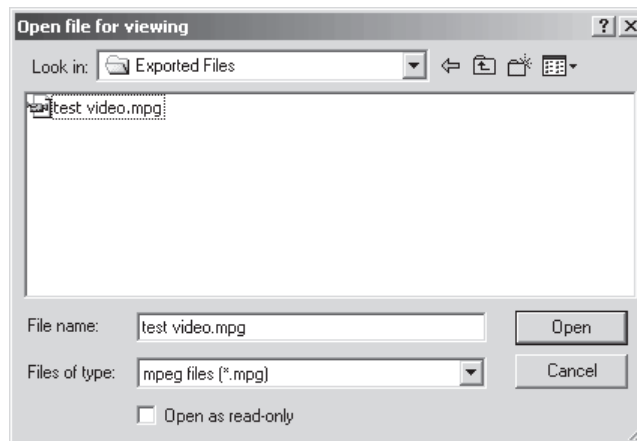


Figure 54. Open Video File Dialog Box

3. Select the file you want to view.

4. Click Open. The video plays automatically. Refer to Figure 55.

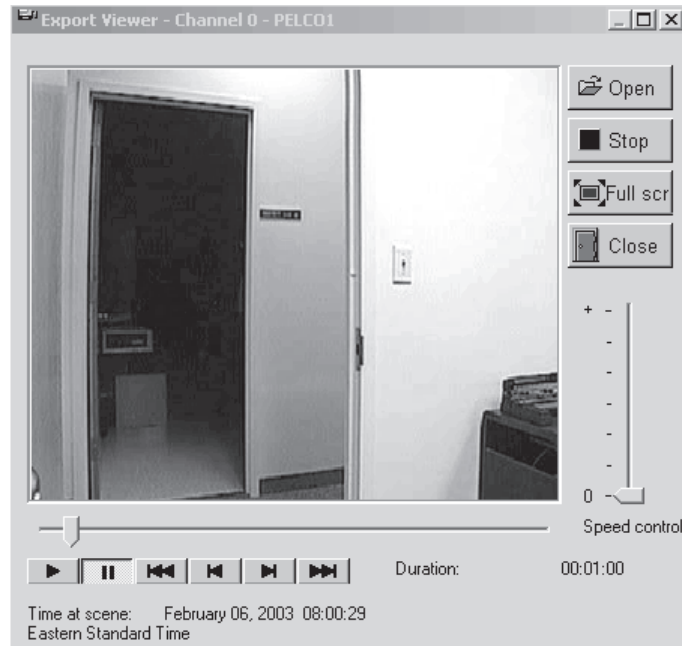



Figure 55. Video Playback

The date and time of the video is displayed below the video play bar. The speed control allows you to change the speed at which the video is played. The 0 represents normal speed. Click  to view the video on the entire screen.

VIDEO VERIFIER

This is an external software application that is supplied with DX9000 systems. It allows you to verify the authenticity of recorded video by identifying if and where an image or segment of video was changed.

You can only browse and verify files that have been exported as MPEG files.

NOTE: When you export a video and want to write the data onto a CD, make sure you copy Video Verifier to the same directory as the exported video.

1. Go to Start > Programs > DX9000 Viewstation > Video Verifier.

Once the application opens, the following window appears.

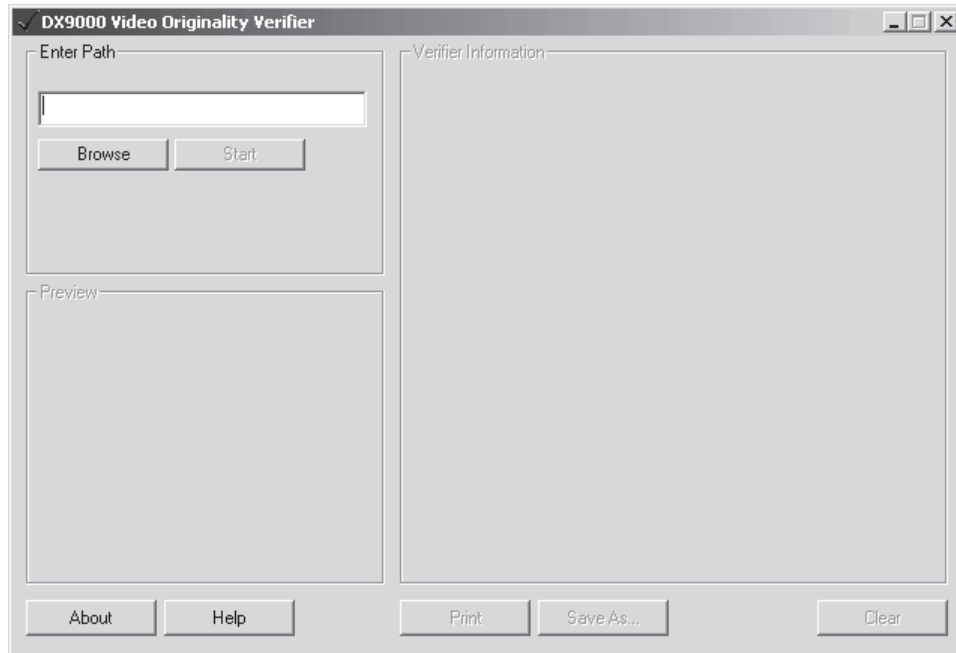


Figure 56. Video Originality Verifier Window

2. Enter the path name of the video file, or click Browse to locate the file.

3. Select the video file and then click Open.

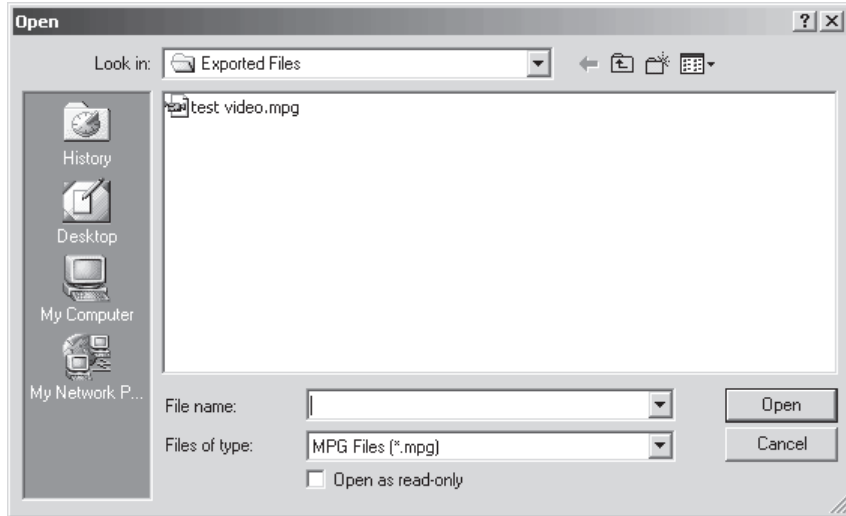


Figure 57. Open Verifier File Dialog Box

4. Verification starts automatically. The following preview window shows the first frame of the video being tested.

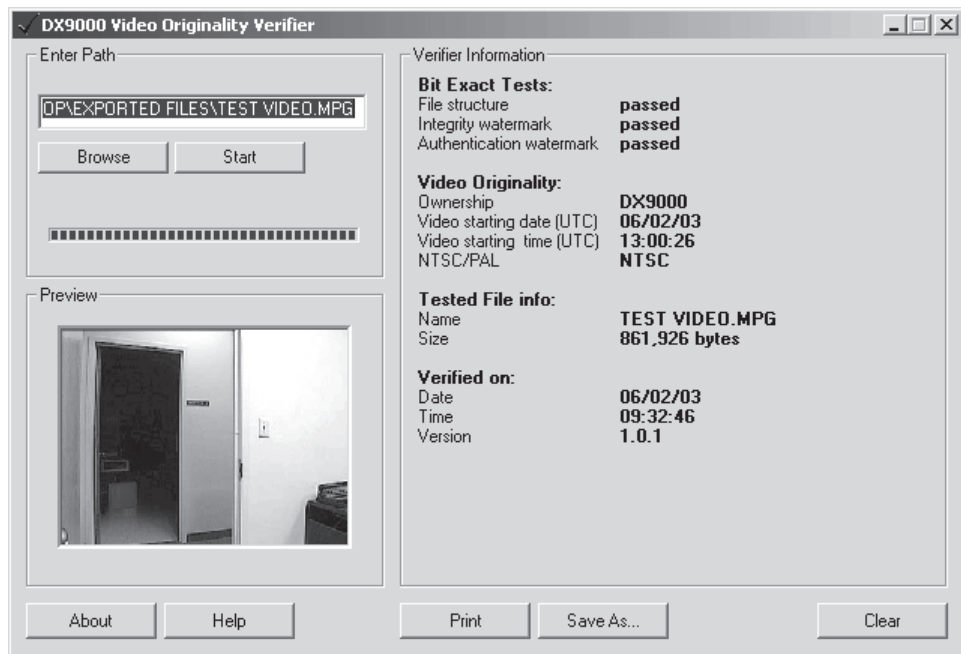


Figure 58. Verifier Information Window

Table E. Verifier Information Panel

Name	Description/Action
Bit Exact Tests:	
File structure	Checks the syntax of the video file.
Integrity watermark	Checks that bits in the video file have not been deleted or modified.
Authentication watermark	Checks the time and date inside the video stream.
Video Originality:	
Ownership	DX9000 Server.
Video starting date	Starting date of the original video.
Video starting time	Starting time of the original video.
NTSC/PAL	Video standard of the original video.
Tested File Info:	
Name	File name of the tested video file.
Size	Size of the tested video file in bytes.
Verification Information:	
Date	Date of the test.
Time	Time of the test.
Version	Version of the Video Verifier application.

If the test is unsuccessful, the following information appears in the Verifier Information panel.

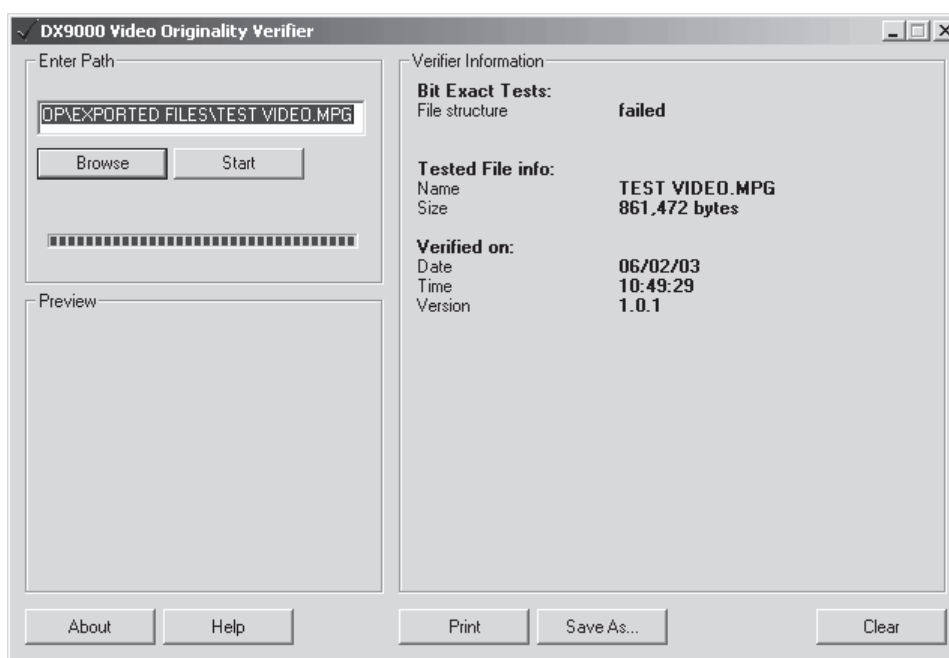


Figure 59. Failed File Structure Message

Table F. Failed Test Information

Name	Description
Bit Exact Tests:	
File structure	Indicates that the test has failed.
Tested File Info:	
Name	Name of the tested video file.
Size	Size of the tested video file in bytes.
Verification Information:	
Date	Date of the test.
Time	Time of the test.
Version	Version of the Video Verifier application.

You can do the following from the Video Verifier window.

Table G. Video Verifier Buttons

Button	Action
Start	Click to rerun a test.
About	Click to see the DX9000 Bit Exact Video Originality Verifier window.
Help	Click to read an overview on Bit Exact Integrity and Authentication Watermark.
Print	Click to print the Verifier Information results.
Save As	Click to save the results as a text (.txt) file.
Clear	Click to clear the window of the results.

MAKING A CD OR DVD

You can use Nero® to copy data, such as exported video files, onto a CD or DVD. The following steps show how to copy a folder onto a CD.

1. Insert a blank CD into your CD-RW drive.
2. Double-click the Nero StartSmart icon on your desktop. The following window appears.



Figure 60. Welcome Window

3. Click CD, and then select the data icon next to the star.



Figure 61. Data Window

4. Click Make Data Disc. The following window appears

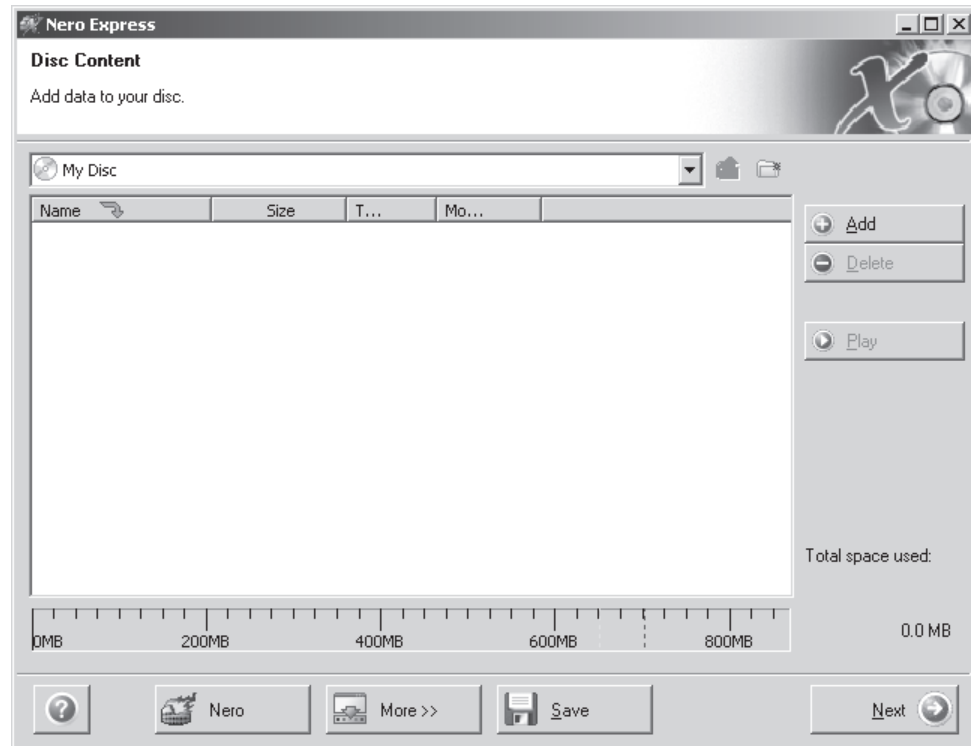


Figure 62. Add Files Window

5. Click Add. The following window appears.

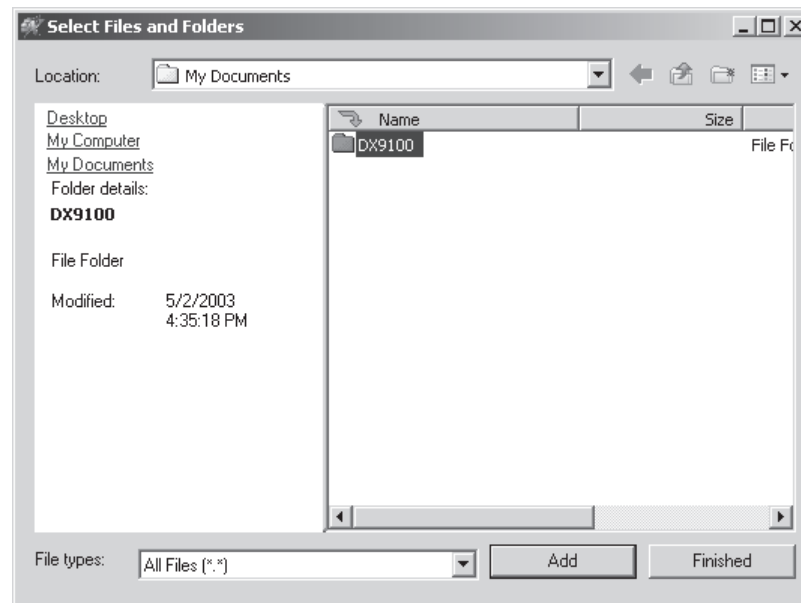


Figure 63. Select Files and Folders Window

6. Select a file or folder, and then click Add. Figure 63 shows a DX9100 folder.

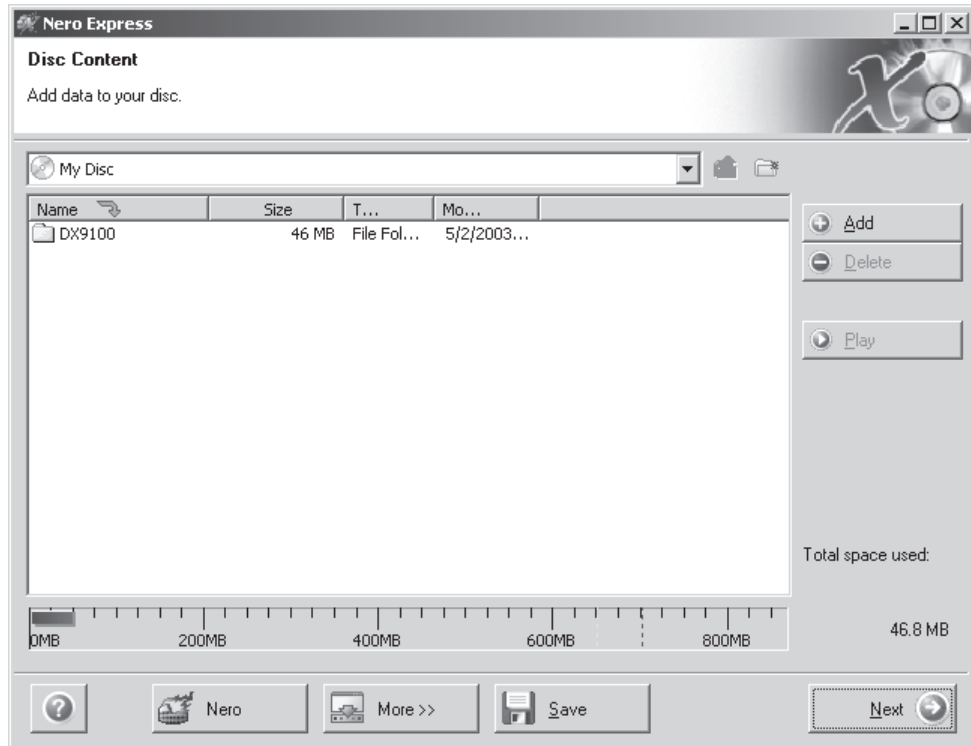


Figure 64. Added File Window

7. Click Next. The following window appears.

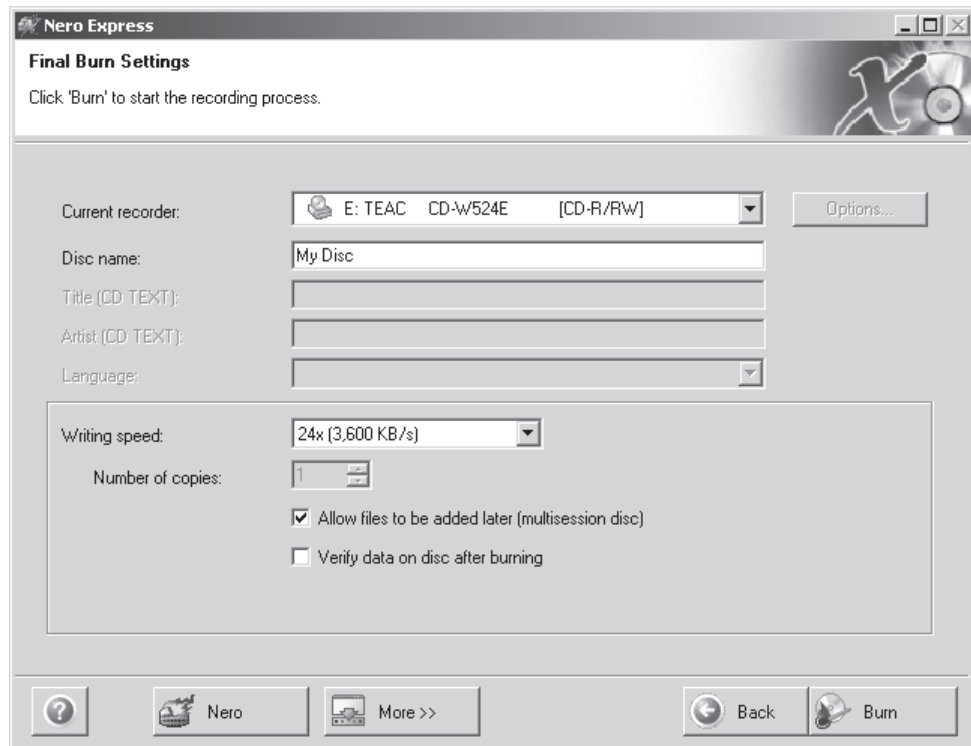


Figure 65. Final Burn Settings Window

- Click Burn. The following dialog box appears when the burn process is completed successfully.

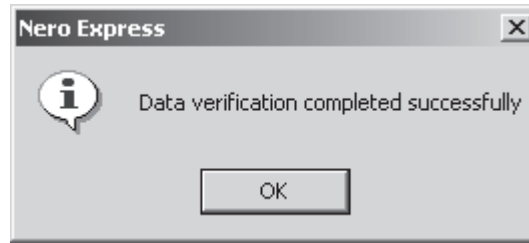


Figure 66. Data Verification Dialog Box

- Click OK.

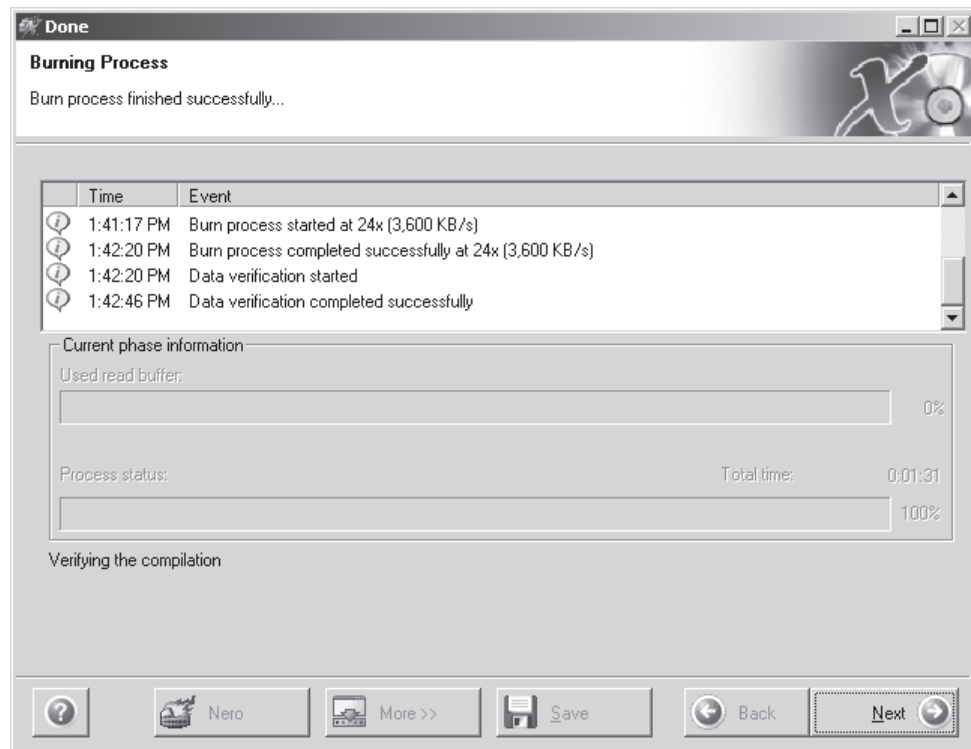


Figure 67. Burning Process Window

10. Click Next. The following window appears.

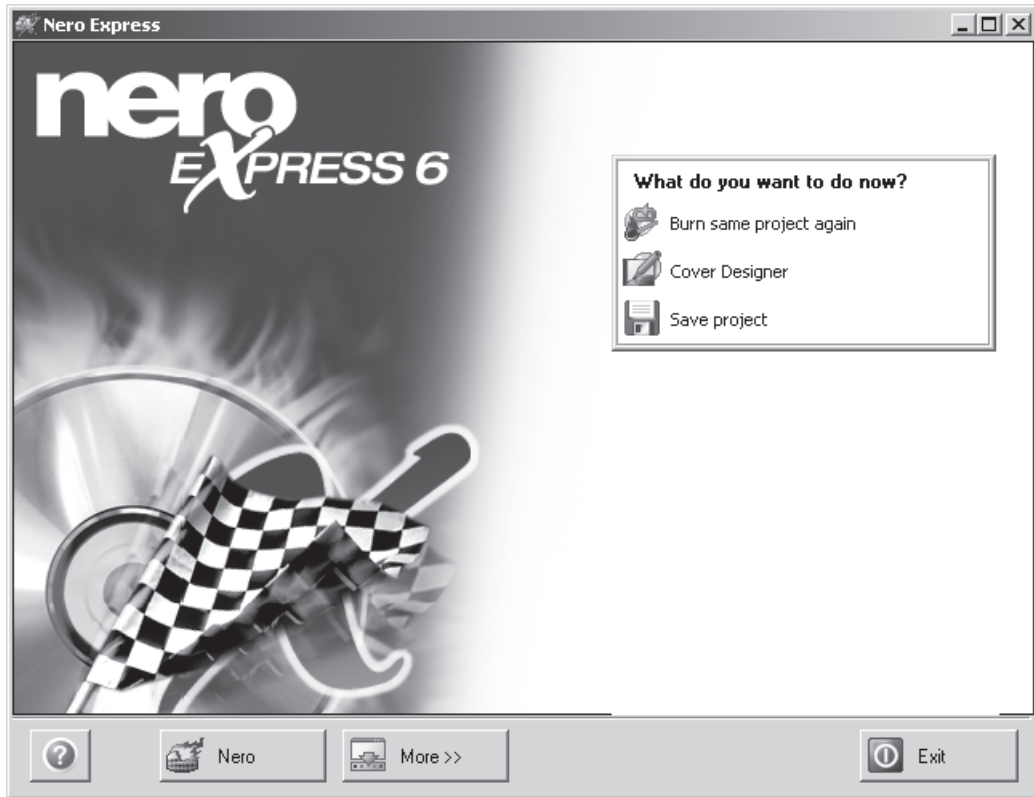


Figure 68. Exit Window

11. Click Exit.

SERVER STATE

The Server State utility checks the status of the recorders that are connected to the viewstation. It verifies if a recorder is recording, not recording, or unreachable. The Server State application should be running in the background all the time.

1. Go to Start > Programs > DX9000 Viewstation > Server State.

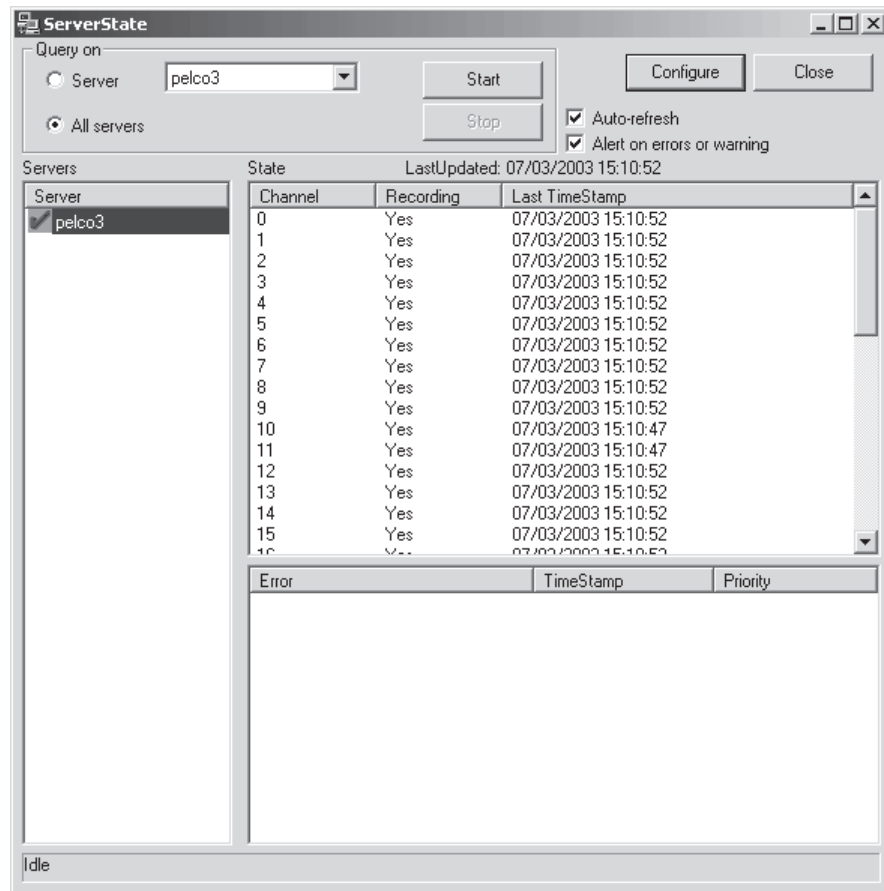


Figure 69. Server State

2. Select "All servers" to run the test on all recorders or Server to run the test on a specific recorder.
3. Click Configure. The following dialog box appears.

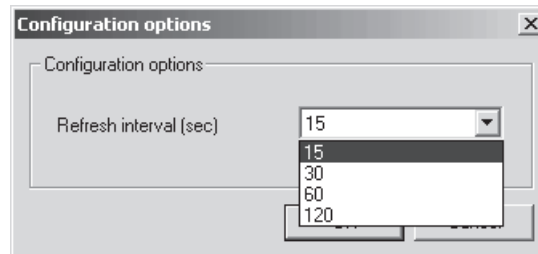


Figure 70. Configuration Options

4. Select the refresh interval. The recommended setting is 60 seconds. Any setting less than 60 seconds will become network intensive because the viewstation constantly polls the recorders.
5. Click OK.
6. Check the "Auto-refresh" checkbox. The application checks the refresh interval when you click start.
7. Check the "Alert on errors or warning" checkbox. The following message appears when an error occurs.



Figure 71. Error Alert Message

NOTE: Checking the "Alert on errors or warning" checkbox activates the serveralert.exe file in C:\Viewstation\Config. You can replace this file with a batch (.bat) file that can send a text message to any other computer. The batch file must be called serveralert.bat.

8. Click Start. The following table explains the symbols that appear next to the server name.

Table H. Server State Symbols

Symbol	Status
?	Status is not known. The server has not been tested yet.
→	Test in progress. This arrow appears next to each server being tested.
✓	The server is working.
⊘	Server alert. The error alert message above appears. The error results appear in the bottom right panel.
⚠	Alerts you to a server problem even though the server is still recording.

ONLINE STORAGE METER

The Online Storage Meter measures how much storage a group of cameras is using in a specific time frame.

1. Go to Start > Programs > DX9000 Viewstation > Online Storage Meter.

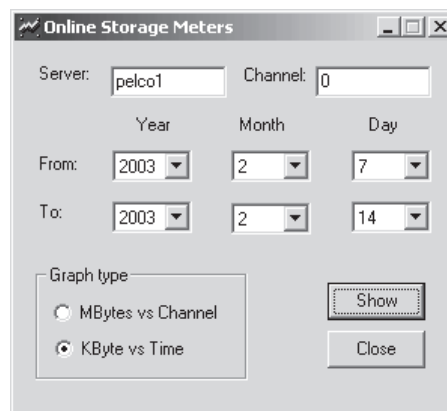


Figure 72. Online Storage Meter

2. Enter the Server name and the Channel number.
3. Select a specific time frame.
4. Select the graph type.
5. Click Show.

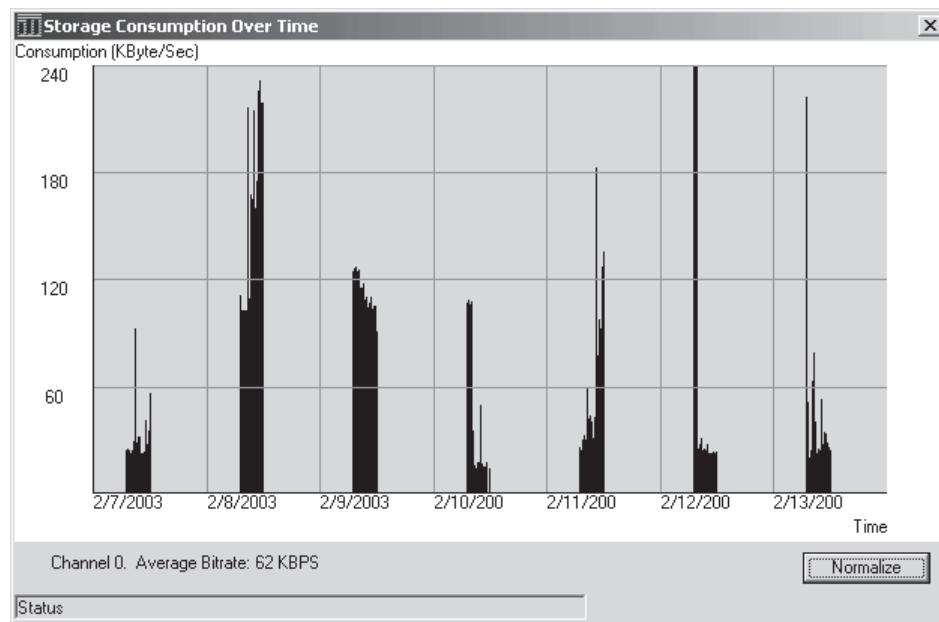


Figure 73. Storage Consumption Graph

WARRANTY

Pelco will repair or replace, without charge, any merchandise proved defective in material or workmanship for a **period of one year** after the date of shipment.

Exceptions to this warranty are as noted below:

- Five years on the following fixed camera models: CC3701H-2, CC3701H-2X, CC3751H-2, CC3651H-2X, MC3651H-2, and MC3651H-2X.
- Three years on all fixed camera models (including Camclosure® Integrated Camera Systems) and Genex® Series (multiplexers, server, and keyboard).
- Two years on all other standard motorized or fixed focal length lenses.
- Two years on Legacy®, CM6700/CM6800/CM8500/CM9500/CM9700 Series Matrix, DF5 and DFB Series Fixed Dome products.
- Two years on Spectra®, Esprit®, and PS20 Scanners, including when used in continuous motion applications.
- Two years on Esprit® and WW5700 series window wiper (excluding wiper blades).
- Eighteen months on DX Series digital video recorders and NVR300 network video recorders.
- One year (except video heads) on video cassette recorders (VCRs). Video heads will be covered for a period of six months.
- Six months on all pan and tilts, scanners or preset lenses used in continuous motion applications (that is, preset scan, tour and auto scan modes).

Pelco will warrant all replacement parts and repairs for 90 days from the date of Pelco shipment. All goods requiring warranty repair shall be sent freight prepaid to Pelco, Clovis, California. Repairs made necessary by reason of misuse, alteration, normal wear, or accident are not covered under this warranty.

Pelco assumes no risk and shall be subject to no liability for damages or loss resulting from the specific use or application made of the Products. Pelco's liability for any claim, whether based on breach of contract, negligence, infringement of any rights of any party or product liability, relating to the Products shall not exceed the price paid by the Dealer to Pelco for such Products. In no event will Pelco be liable for any special, incidental or consequential damages (including loss of use, loss of profit and claims of third parties) however caused, whether by the negligence of Pelco or otherwise.

The above warranty provides the Dealer with specific legal rights. The Dealer may also have additional rights, which are subject to variation from state to state.

If a warranty repair is required, the Dealer must contact Pelco at (800) 289-9100 or (559) 292-1981 to obtain a Repair Authorization number (RA), and provide the following information:

1. Model and serial number
2. Date of shipment, P.O. number, Sales Order number, or Pelco invoice number
3. Details of the defect or problem

If there is a dispute regarding the warranty of a product which does not fall under the warranty conditions stated above, please include a written explanation with the product when returned.

Method of return shipment shall be the same or equal to the method by which the item was received by Pelco.

RETURNS

In order to expedite parts returned to the factory for repair or credit, please call the factory at (800) 289-9100 or (559) 292-1981 to obtain an authorization number (CA number if returned for credit, and RA number if returned for repair).

All merchandise returned for credit may be subject to a 20% restocking and refurbishing charge.

Goods returned for repair or credit should be clearly identified with the assigned CA or RA number and freight should be prepaid. Ship to the appropriate address below.

If you are located within the continental U.S., Alaska, Hawaii or Puerto Rico, send goods to:
Service Department
Pelco
3500 Pelco Way
Clovis, CA 93612-5699

If you are located outside the continental U.S., Alaska, Hawaii or Puerto Rico and are instructed to return goods to the USA, you may do one of the following:

If the goods are to be sent by a COURIER SERVICE, send the goods to:
Pelco
3500 Pelco Way
Clovis, CA 93612-5699 USA

If the goods are to be sent by a FREIGHT FORWARDER, send the goods to:
Pelco c/o Expeditors
473 Eccles Avenue
South San Francisco, CA 94080 USA
Phone: 650-737-1700
Fax: 650-737-0933

REVISION HISTORY

Manual #	Date	Comments
C639M	9/03	Original version.
C639M-A	6/04	Revised <i>Making a CD</i> section.



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